### **Optimizing Communication Between Decisionmakers And** Intelligence Analysts Stopping "Slam Dunks" And Avoiding "Dead Wrongs"

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by

Jennifer Lee Wozny

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Jennifer L. Wozny Erie, PA May 12, 2005

#### **Abstract**

In order to address and avoid intelligence failures, the United States (US) Intelligence Community (IC) must furnish its analysts with guidelines directed towards optimal communication with decisionmakers. This thesis creates and tests such guidelines through three steps. First, the thesis surveys writing and commentary of forty-one US decisionmakers from the Business, Law Enforcement and National Security communities and arrives at a set of fourteen maxims that outline what they want from their analysts. Second, it breaks down seven style manuals and uses research from academia, science and other experts to either support, oppose or expand upon their principles, resulting in twenty-three rules that analysts can use to optimize communication. Third, the thesis evaluates three intelligence documents – all notable failures – against the maxims and rules to test the latter's validity and to determine where exactly the IC failed. Finally, the thesis concludes with a summary of strongest findings, suggestions for further study and the author's personal comments.

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# Chapter 1: Why Should We Optimize Communication Between Intelligence Decisionmakers And Analysts?

#### Introduction<sup>1</sup>

"From the end of one of the couches in the Oval Office, Tenet rose up, threw him [sic] arms in the air. 'It's a slam-dunk case!' the director of central intelligence said.... 'Don't worry, it's a slam dunk!'"

Director of Central Intelligence George Tenet to President George W. Bush on the certainty that Iraq had Weapons of Mass Destruction, December 21, 2002 (Woodward, 2004, Failing to Persuade the 'Jury' section, p. 4)

### "We conclude that the Intelligence Community was dead wrong in almost all of its pre-war judgments about Iraq's weapons of mass destruction."

The Commission on the Intelligence Capabilities of the United States Regarding Weapons of Mass Destruction, in letter of transmittal to President George W. Bush, March 31, 2005 (Silberman, Robb, Levin, McCain, Rowen, Slocombe, Studeman, Wald, Vest, & Cutler, 2005, letter of transmittal section, para. 2)

Communication, as any marriage counselor will assert, is the key to a happy and successful relationship. This principle is not limited to marriage, however; it extends into every type of relationship where knowing exactly what another party thinks, means and is trying to convey holds even the slightest significance. There is scarcely a relationship more important than that between decisionmakers and analysts working within the United States (US) Intelligence Community (IC).

If "[a]nalysts are the voice of the Intelligence Community" (Silberman, Robb, Levin, McCain, Rowen, Slocombe, Studeman, Wald, Vest, & Cutler, 2005, p. 388), then the worst case scenario is a bad connection, like a mock Verizon commercial: "Can you hear me now?" As a disoriented USIC tries to dig out of "a pretty deep hole" (Ignatius, 2005, para. 4), the solution "is not more spies and satellites" (Woodward & Eggen, 2002, para. 14). The solution, at least in part, is enhanced, nay, *optimized* communication in the most important of relationships.

Ideally, the goal is to preclude intelligence failures. Well, what happens when there *is* an intelligence failure? That is, what is the usual consequence? In short, it is this: When there is "intelligence failure, in the end there will be…the human victims…" (De Jong, Platje, & Steele, Eds., 2003).

"Victim" is perhaps the saddest word in the dictionary. Whether you call 9/11 an intelligence failure (3000 innocent lives), the Iraq war an intelligence failure (no less than 4000 lives), or Pearl Harbor an intelligence failure (2403 lives), in every case, someone died. In most cases, the dead did not ask for their fate, nor did they do

<sup>&</sup>lt;sup>1</sup> This thesis utilizes, to the greatest extent possible, the applicable rules of communication, style and formatting discovered as a result of this research. The intent of using these rules in this way is to improve the readability of this thesis.

anything to provoke it. Likewise, Business and Law Enforcement Intelligence failures, while often less well documented, are just as dramatic as crime rampages across a city or well-established businesses fail and fold under pressures unseen by their own intelligence units.

That, then, is the ultimate goal of this thesis – to aid in reforming the United States Intelligence Community, to improve Business and Law Enforcement Intelligence practices, to preclude the loss of lives and livelihoods, especially among the innocent.

#### **Purpose**

The purpose of this research is to determine the optimal communication style for intelligence analysts when they interact with decisionmakers in the National Security, Law Enforcement and Business Intelligence fields and to generate a set of guidelines that analysts can follow to ensure this.

### Research Questions Decisionmakers:

- 1. What do decisionmakers want in and from their written intelligence products?
- 2. What do they want from their analysts?
- 3. What are the desires/demands common to most or all intelligence decisionmakers?

#### Analysts:

- 1. What writing and communication guidance do analysts currently receive?
- 2. Does it fulfill the decisionmakers' wants?
- 3. Does it teach and consider optimal methods of communication?
- 4. What is the academic, scientific and expert reasoning behind the guidance analysts currently receive, and does it support or oppose this guidance?

#### **Decisionmakers And Analysts Compared:**

- 1. What are the discrepancies, if any, between what decisionmakers want and what analysts currently provide?
- 2. What are some rules or steps that analysts can follow to ensure they meet their decisionmakers' demands for intelligence writing and communication?

#### Application:

1. Is it possible to apply these "rules" to intelligence products to determine whether past products were – and future products will be – effective?

#### Conclusion:

1. What does this study say about how the intelligence communities should educate their analysts?

#### Delimitation

This study will confine itself to surveying a limited number of US decisionmakers, as well as dissecting and evaluating a limited number of English language writing and style manuals.

#### Limitation

The purposive sampling procedure decreases the ability to apply the findings to all future cases. This study will provide general guidance relevant to all decisionmakers and all aspects of the broader intelligence community but may not apply in every specific case.

As it is impossible here to include information on every nuance of "communication", for example telephone conversations, crises, in-person briefings, ad hoc meetings, or dealing with difficult or challenged people, such topics are areas for further study. It would perhaps also be useful to query a much broader range of US decisionmakers for a highly detailed idea of what they want from their analysts.

#### Significance

It is possible that this paper's findings will contribute to the re-design of existing style manuals used by Business, Law Enforcement and National Security agencies to provide analysts with the most current, accepted and effective communication techniques available.

In this way, the results are important specifically for US intelligence analysts and possibly for intelligence analysts worldwide. United States decisionmakers could benefit if the findings lead analysts to enhance the quality of their products, and if communication between the two improves overall.

Regardless of what this paper may or may not do, it will definitely add significantly to the literature on how to write for and communicate within the intelligence discipline. This document is the first of its kind to ask the spectrum of decisionmakers what *they* want from intelligence, to examine what intelligence style manuals direct analysts to give these decisionmakers, to delve into the world of academia, science and expert opinion to determine whether these manuals are giving analysts the correct advice, and to form a set of guidelines that incorporates the decisionmakers' desires with fact-based best practices for communication.

Coming on the heels of the report by the Commission on the Intelligence Capabilities of the United States Regarding Weapons of Mass Destruction (WMD Commission) that desires analysts to present all relevant information "in a manner useful to decisionmakers" (Silberman et al., 2005, p. 388), widespread criticism of the writing in the August 6, 2001 President's Daily Brief, a 9/11 Commission Report recognizing that analysts could have "shed some light" on what they meant regarding certain aspects of the August 6 report (Kean, Hamilton, Ben-Veniste, Kerrey, Fielding, Lehman, Gorelick, Roemer, Gorton, & Thompson, 2004, p. 345), an Intelligence Community that a senior intelligence official feels is "perceived as incompetent" (Ignatius, 2005, para. 4), and the new, as yet largely unstructured Office of the National Intelligence Director, this thesis is nothing if not timely.

## **Chapter 2: Are Analysts Receiving Sufficient Communication Guidance?**

#### Introduction

Nothing that is currently available does what this thesis seeks to do – optimize written communication in the Intelligence Community.

As Chapter 1 outlined, there is a clear need for improving communication between analysts and decisionmakers in Business, Law Enforcement and National Security. Given the lack of texts and other literature that directly examine the process of analyst-decisionmaker communication writ large, the closest logical sources for guidance on how to communicate are style manuals; essential handbooks designed to standardize the writing procedure in attempts to increase communication. Since the "goal of writing is to communicate" (Borden, n.d., para. 3), the self-stated purpose of these manuals is to aid communication. As this brief outline will make clear, style, by itself, is not enough.

The purpose of this literature review is to discuss style in general, to outline what it can do to aid communication as well as what it fails to do. Specific style manuals and rules either from or directly applicable to the intelligence community are discussed in full in Chapter 4: Section Two.

#### **Defining Style**

There are a variety of different styles. Styles appropriate for one form of writing, academic papers and theses, for example, are unlikely to be appropriate in another context, such as business or law enforcement. All style manuals, however, contain certain thematic similarities.

All style manuals contain rules. "Style' refers both to a manner of writing and to the specific spelling and other rules which guide a publication", writes Institute for War & Peace Reporting's (IWPR) Executive Director, Anthony Borden (n.d., para. 1). The aim of a style guide is to "avoid inconsistency, awkwardness or confusion that may hinder the reader" (Borden, n.d., para. 2).

"As soon as you move one step from the bottom, your effectiveness depends on your ability to reach others through the spoken or written word."

Peter F. Drucker, quoted in the US Army Training and Doctrine Command's style manual (Beckno, n.d., p. 11-1) IWPR wrote a manual specifically to help "local journalists in societies undergoing major crisis and change" (Bickler, Borden, Chazan, Davis, Jukes, MacLeod, Stroehlein, Sullivan, Vultee, & West, 2004, p. 8). The manual "outlines the core internationally recognised [sic] standards of journalism and provides essential guidance on many of the basic techniques of reporting" (Bickler et al., 2004, p. 8).

The National Weather Service (NWS), on the other hand, also developed a style manual; theirs is for the NWS internal communications program, an effort to communicate relevant news and information to contractors,

employees and managers (Reichenbaugh, 2004, Objective section, p. 2). The NWS program enables employees to "voice issues and share information", and offers an inhouse newsletter, *NWS Focus*, which accepts articles, photos, story ideas, photos, and announcements. While the context is different, the emphasis on clear rules is the same. The corresponding style manual includes guidance on length, topic, style (Reichenbaugh, 2004, p. 4), submission procedure, and required details (Reichenbaugh, 2004, p. 5).

Style manuals are usually written for specific types of audiences. Successful militaries are not known for vague, long-winded writing. The US Army is no different. The style manual for the United States (US) Army Training and Doctrine Command recognizes that readers have no time for obscure writing in today's world of "time constraints and information overload", and notes readers will read and quickly understand well-written documents (Beckno, n.d., p. 11-1). The manual's objectives then, are to identify "standards and rules for Army writing", such as proper grammar, brevity, proper emphasis, packaging that facilitates easy reading, and the writer's use of editing tools (Beckno, n.d., p. 11-1). Applying the lesson's teaching points would result in clear, concise and vigorous quality writing (Beckno, n.d., p. 11-1).

The style manual for the United States Army Materiel Command (USAMC) – another command within the US Army – focuses less on general structure and more on rules clearly relevant to the audience for which the style manual was written:

- contains "selected approved policies and practices for staff operations and administrative procedures" (USAMC, 2003, Purpose section, p. 1-1);
- provides instructions "on the preparation of correspondence used within [Headquarters U.S. Army Materiel Command] HQ AMC and collocated activities" (USAMC, 2003, Purpose section, p. 1-1); and
- applies to "HQ AMC and collocated activities, to include subordinate activities reporting directly to HQ AMC" (USAMC, 2003, Purpose section, p. 1-1).

Companies, as well as government organizations, write their style manuals for specific audiences. The resources provided by Business Writing.com, a website offering writing tips, information and assistance for business writers, helps businesses understand how "to provide company-wide standards for writing effective workplace email, memos, letters, and reports" (Business Writing.com Home, n.d., Business Writing Guidelines section, para. 1).

Some style manuals consciously adopt the style of other, similar fields. The US Department of Energy's (DOE) Office of Science and Technology (OST) does not use a single style manual, and instead recommends five, which "provide acceptable guidance on most stylistic issues" (Department of Energy, n.d., Standard Style Guides section, p. 1):

- United States Government Printing Office, Style Manual, Washington, D.C.,
   1984. "Primarily a printer's style book to standardize copy submitted to GPO.
   Limited in detail and somewhat dated" (Department of Energy, n.d., Standard Style Guides section, p. 1);
- Chicago Manual of Style, 14th ed., University of Chicago Press, Chicago, 1993.
   "Widely regarded as the industry standard for general publications. Thorough and well indexed" (Department of Energy, n.d., Standard Style Guides section, p. 1);
- Associated Press Style Book and Libel Manual, 6th trade ed., Addison-Wesley, Reading, Mass., 1996. "Espouses an informal, journalistic style appropriate for articles intended for general readership. Not as complete or well organized as Chicago Manual" (Department of Energy, n.d., Standard Style Guides section, p. 1);
- Ellen Swanson, *Mathematics into Type: Copyediting and Proofreading of Mathematics and for Editorial Assistants and Authors*, American Mathematical Society, Providence, R.I., 1971. "Prescribes format for equations and other mathematical expressions" (Department of Energy, n.d., Standard Style Guides section, p. 1).

Further, the Meriam Library at California State University compiled a list of the style manuals and research guides they have available. The list reveals that students may choose from twelve style manuals, six guides for conducting research and ten resources for writing term papers – or, twenty-eight potential manuals to guide them through the writing process (Meriam Library, n.d.)(See Annex 1 for a complete list of manuals).

Some style manuals actually achieve prominence in a number of fields, though this is a rarity. William Strunk, Jr. wrote his well-known style manual, *The Elements of Style*, "for use in English courses in which the practice of composition is combined with the study of literature" (Introductory section, para. 1). The manual aims to focus only on the main requirements of plain English style, a few essential rules of usage and the most commonly violated principles of composition (Strunk, Introductory section, para. 1).

#### **Beyond Style**

There is more to communication than just 'style', however, particularly in the intelligence context. The report, published in March 2005, by the Commission on the Intelligence Capabilities of the United States Regarding Weapons of Mass Destruction (WMD Commission) discussed at length the Intelligence Community's need for better communication, yet it hardly talked about the proper margin size or good grammar as the above manuals do. Some of the WMD Commission's findings regarding communication include:

- "we found an analytical community...too slow to communicate gaps and uncertainties to policymakers" (Silberman, Robb, Levin, McCain, Rowen, Slocombe, Studeman, Wald, Vest, & Cutler, 2005, p. 309);
  - "analysts must communicate the uncertainty of their judgments, and the degree to which they rely on narrow assessments about specific indicators" (Silberman et al., 2005, p. 124);
- "we found an Intelligence Community in which analysts have a difficult time stating their assumptions up front, explicitly explaining their logic, and, in the end, identifying unambiguously for policymakers what they do not know" (Silberman et al., 2005, p. 389);
  - "analysts must always recognize, and communicate to decisionmakers, the tenuous quality of their reasoning" (Silberman et al., 2005, p. 125);
- "[National Intelligence Estimates] NIEs must be carefully caveated and the degree of uncertainty in the judgments clearly communicated" (Silberman et al., 2005, p. 182);
  - "the NIE...failed to communicate the paucity of intelligence supporting its assessments" (Silberman et al., 2005, p. 74);
- "collectors did not adequately communicate, the limitations of imagery collection" (Silberman et al., 2005, p. 125);
- the "Community did not adequately communicate uncertainties about...its sources...to policymakers" (Silberman et al., 2005, p. 175);
- had "even the most elemental communication and coordination taken place—in the form of a phone call from Homeland Security to the [Federal Bureau of Investigation] FBI—this fact might have surfaced earlier, thereby avoiding the squandering of limited counterterrorism resources" (Silberman et al., 2005, p. 297);
- the "[Director of National Intelligence] DNI should…make finished intelligence available to customers in a way that enables them…to more easily… communicate with analysts" (Silberman et al., 2005, p. 417); and
- the "best intelligence in the world is worthless unless it is effectively and accurately communicated to those who need it" (Silberman et al., 2005, p. 26).

The Commission recommended some steps to take to affect better communication and improve analytic tradecraft, such as increased analyst training (Silberman et al., 2005, p. 26), demanding more from analysts in the form of probing questions from decisionmakers (Silberman et al., 2005, p. 27), creating Community-wide standards for analysis to facilitate comprehension and reliability throughout analytic units (Silberman et al., 2005, p. 391), demanding clear writing, articulated and caveated assumptions, and use of standard sourcing methods (Silberman et al., 2005, p. 409), more efficient, effective and modern distribution of products according to decisionmaker preference (Silberman et al., p. 417), and user-friendly interfaces when presenting online data (Silberman et al., 2005, p. 417).

"Analysts are the link between customers and the Intelligence Community", states the WMD Commission (Silberman et al., 2005, p. 416). In their role as a conduit for "providing intelligence to customers... [and] conveying the needs and interests of customers to collectors", analysts must "clearly and concisely communicate the information they have, the information they need, the conclusions they draw from the

"[I]t was a failure to communicate effectively with policymakers". The Commission on the Intelligence Capabilities of the United States Regarding Weapons of Mass Destruction (Silberman et al., 2005, p. 3, para. 3)

data, and their doubts about the credibility of the information or the validity of their conclusions" (Silberman et al., 2005, p. 416).

Major Dan Ward, US Air Force concurs: "Analysts need to recognize that communication and collaboration are key aspects of analytical tradecraft" (2005, Communication: The Key To Access section, para. 1). Despite this, a National Geospatial Intelligence Agency-sponsored (NGA) Focus Group report from January

2004 "reports that 83% of the analysts queried believed communication with customers is difficult. Zero percent said it is easy" (Ward, 2005, Communication: The Key To Access section, para. 1).

This begs the question: What *does* communication mean in the intelligence context? Style manuals are necessary, but not sufficient conditions for communication in intelligence; that is, they are good, but not enough.

# Chapter 3: Methodology To Determine Optimal Communication

#### Introduction

This thesis will attempt to determine what exactly "effective communication" means in the context of intelligence. It will further attempt to define a set of criteria that analysts may apply to affect an optimal level of communication between themselves and their decisionmakers. To do so, the remainder of the thesis divides into three parts.

#### **Section One**

First, this thesis will attempt to determine what effective communication means in the context of intelligence by surveying United States (US) decisionmakers as to what they want from analysts.

Data collection procedures for this section will follow a set of criteria. All individuals used here:

- are or have been decisionmakers, or are or have been close to decisionmakers;
- have written at least somewhat extensively on the act of decisionmaker-analyst communication;
- come from one of the three intelligence disciplines, that is, Business, Law Enforcement or National Security; and
- come from the post-World War II (WWII) period (the distinction is important as the Intelligence Community was only in its seminal stages of development during and prior to WWII).

Regarding the last point, recent decisionmakers, writing after the advent of the Internet, make up the bulk of the sample as data from them is likely more relevant in determining the needs of future intelligence decisionmakers.

Summarizing the portions of the decisionmaker's writing that discusses their views on analysts and analysis should reveal commonalities and disagreements, if any, between all decisionmakers. It is hypothesized that there will be large areas of agreement (but not total agreement) across the multiple decisionmakers. That said, the author does not enter into this exercise with any preconceptions. Instead, all findings will "bubble up" as a result of the process.

#### **Section Two**

Second, in efforts to expand and validate decisionmakers' demands, the thesis will next provide a detailed examination of a handful of relevant style manuals, supporting or opposing their guidance with research from academia, science and other experts.

A relevant style manual, in the context of this thesis, is one that supports:

- one of the three intelligence sectors (Business, Law Enforcement or National Security); or
- journalistic or related writing styles, such as technical writing; and
- does not promote typical academic writing styles that, for example, stress page length over necessity and an introduction-body-conclusion over bottom line up front

The end of this section will compare what the decisionmakers want (from Section One) with what the style manuals instruct analysts to provide (from Section Two). It is hypothesized that there will be substantial but not complete consistency between the style manuals, academics, scientists, and other experts in relation to what decisionmakers want. The former group, after all, tasks itself with the goal of delivering an effective product to its audience. If for some reason this is not the case, then the Intelligence Community is in worse shape than anyone thought.

#### **Section Three**

Third, this thesis will apply the results of the first and second sections to some notable intelligence documents, all of which were clear intelligence failures. This section's intent is to determine whether the communication style shaped the estimates' fate. As this section will identify commonalities in failed intelligence documents, it may be possible for analysts to rectify and avoid future miscommunications by applying the results of sections one and two to future documents.

#### Conclusion

Finally, the author will conclude with an examination of supportable and partially supportable conclusions, a list of recommended research topics and a personal response to the research.

# Section One: What Decisionmakers Want From Intelligence

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## Introduction: Communities Of Decisionmakers

The intent of this section is to determine what decisionmakers want from intelligence professionals. There are three communities that intelligence traditionally supports. The oldest and most well developed is the National Security community composed of well-known agencies such as the Central Intelligence Agency (CIA) and the National Security Agency (NSA). Newer communities include the law enforcement community, which includes not only the Federal Bureau of Investigation (FBI) but also state and local law enforcement, and the business community.

# **National Security**

In 1946, United States President Harry S. Truman formed the Central Intelligence Group (CIG) (later renamed the Central Intelligence Agency in 1947), to create a centralized intelligence organization that would provide the comprehensive and formal intelligence that the government needed (Truman, 1956, p. 56). "The war [World War II] taught us this lesson – that we had to collect intelligence in a manner that would make the information available where it was needed and when it was wanted, in an intelligent and understandable form. If it is not intelligent and understandable, it is useless" (Truman, 1956, p. 56). In that same year, head of the Office of Strategic Services (OSS)<sup>2</sup> General William J. Donovan stated that one of OSS' two main assets

"If it is not intelligent and understandable, it is useless."
US President Harry S. Truman

was that "a group of specialists were analyzing and evaluating the information for those who should determine the nation's policies" (Darling, 1990, p. 43). Regarding Truman's proposed CIG, Donovan felt its purpose was "to collect, analyze, and deliver intelligence 'on the policy or strategy level' to the policymakers of the Government as directed by the President" (Darling, 1990, p. 25). From early on, then, US

government officials have stressed the need for analysts who provide timely, intelligent and understandable *intelligence* to US policymakers.

General Wesley Clark, former Supreme Allied Commander, Europe, explains the importance of intelligence in the success of modern wars in *Waging Modern War*, his book about his leading role in the Kosovo campaign in 1999:

Where the American role was dominant was in planning the air operation. The reason was basic. NATO [North Atlantic Treaty Organization] itself had no intelligence. NATO only received national intelligence and then disseminated it.

<sup>&</sup>lt;sup>2</sup> United States President Franklin D. Roosevelt formed the OSS in June 1942 to support the Allied forces in World War II (Pike, 1996, History section, para. 1). OSS had "a mandate to collect and analyze strategic information required by the Joint Chiefs of Staff and to conduct special operations not assigned to other agencies" (Pike, 1996, History section, para. 1). The OSS dissolved in 1946 when President Truman created the Central Intelligence Group.

It had no collection and little analytic capabilities. Nor did NATO possess the means to conduct battle damage assessments. Other NATO member countries also lacked intelligence collection and battle damage assessment capabilities. In fact, 99 percent of the target nominations came from U.S. intelligence sources. In this area, and in this area alone, due basically to lack of European capabilities, the operation assumed an excessively national character (Clark, 2001, p. 427).

#### Law Enforcement & Business

In addition, intelligence no longer confines itself to the national security arena. Today, Law Enforcement (LE) and Business executives also look to intelligence units within their staffs to assist with current, long-term and strategic issues. The intelligence analyst's role for these two sectors is very similar to that of their national security counterparts: they have a decisionmaker to write for, they assimilate and analyze data, and they generate written reports. Also similarly, it is important for LE Intelligence (LEI) and Business Intelligence (BI) analysts to have good communication skills. Law enforcement may feel the effects of poor intelligence in terms of lost lives or injured officers. For Business, flawed estimates typically have a large financial impact.

As with the USIC, LEI and BI belong to their own "community." The International Association of Law Enforcement Intelligence Analysts (IALEIA), formed in 1981, is "dedicated to the special needs of analytical personnel in law enforcement" (IALEIA, n.d., History section, para. 1), and advances "high standards of professionalism in law enforcement intelligence analysis at the Local, State/Provincial, National and International levels" (IALEIA, n.d., Purpose section, para. 1).

Business Intelligence professionals often hold a membership in the Society of Competitive Intelligence Professionals (SCIP), a global network "for everyone involved in creating and managing business knowledge" (About SCIP, 2004, para.1). SCIP's mission "is to enhance the skills of knowledge professionals in order to help their companies achieve and maintain a competitive advantage" (About SCIP, 2004, para. 2).

In order to "advance high standards of professionalism in law enforcement intelligence analysis" (About IALEIA, n.d., Purpose section, para. 1) and "maintain education and networking opportunities for business professionals" (About SCIP, 2004, para. 1), both IALEIA and SCIP offer their members a host of training courses and seminars.

#### Conclusion

Decisionmakers in the National Security, Business and Law Enforcement communities clearly want intelligence. They want it, however, on their own terms. There are good

reasons for this. It is generally the decisionmaker that is putting his assets, his reputation, his country's security on the line. Most decisionmakers know too well – as the discussion of intelligence failure in the US national security community in the next section demonstrates – that an intelligence breakdown cost money, time and lives.

# Case Study: Consequences Of Failing To Communicate In The National Security Community

"We conclude that the Intelligence Community was dead wrong in almost all of its pre-war judgments about Iraq's weapons of mass destruction."

The Commission on the Intelligence Capabilities of the United States Regarding Weapons of Mass Destruction, in letter of transmittal to President George W. Bush (Silberman, Robb, Levin, McCain, Rowen, Slocombe, Studeman, Wald, Vest, & Cutler, 2005, letter of transmittal section, para. 2)

While September 11, 2001 and the Iraq Weapons of Mass Destruction (WMD) estimate are the most notable recent examples of intelligence failure by the United States (US) Intelligence Community (IC), failure appears to be a common theme running throughout the entire history of the Community. Central to these failures has been a failure to communicate – a failure to communicate assumptions, a failure to communicate effectively about sources and a failure to communicate clear estimates – to the decisionmakers the intelligence community is charged with supporting.

Details of these failures – be they from the production or use of intelligence, from the early days of the community or from 2002 – are well documented and startlingly repetitive. The newly released report by The Commission on the Intelligence Capabilities of the United States Regarding Weapons of Mass Destruction (henceforth known as 'WMD Commission'), charged with assessing the intelligence failure that led to the US war against Iraq in March 2004, writes, "As early as 1949, the [First] Hoover Commission faulted the Intelligence Community for failing to improve relations with decisionmakers." (Silberman, Robb, Levin, McCain, Rowen, Slocombe, Studeman, Wald, Vest, & Cutler, 2005, p. 389)

By the time of the Second Hoover Commission in 1955, "a pattern had been already set in place -- every four to eight years, at the time of each administration, someone was looking at reorganizing the Intelligence Community. This trend has not changed appreciably over the years since 1947" (MILNET, Effects of the Cold War section, para. 5).

Robert David Steele, in *The New Craft of Intelligence: Achieving Asymmetric Advantage in the Face of Nontraditional Threats*, outlines a brief history of commissions and committees designed to evaluate US intelligence activities since the late-1940s (See Figure 1).

Adding to this list, a House Intelligence Committee investigation of the Central Intelligence Agency (CIA) in 1975 concluded that Agency analysts failed to:

- "anticipate the timing and intensity of the Tet Offensive in the Vietnam War...
- warn of the Russian invasion of Czechoslovakia...

- predict Egypt's invasion of Israel in 1973...
- forecast the coup in Cyprus." (Utley, 2004, History section, p. 7)

More recently, in the wake of 9/11, a number of reviews have been performed on the IC's handling of intelligence leading up to both 9/11 and the war in Iraq.

The authors of the 9/11 Commission Report write: "We believe the 9/11 attacks revealed four kinds of failures: in imagination, policy, capabilities, and management" (Kean, Hamilton, Ben-Veniste, Kerrey, Fielding, Lehman, Gorelick,

YEAR	REVIEW
1949	First Hoover Commission
	Adversarial relationships between CIA, State, and the military
1955	Second Hoover Commission
	Counterintelligence & linguistic training deficiencies
	CIA to replace State in procurement of foreign publications
1961	Taylor Commission
	Failure in communication, coordination, and overall planning
	<ul> <li>No single authority short of the President capable of coordinating the actions of CIA, State, Defense, and USIA<sup>20</sup></li> </ul>
1971	Schlesinger Report
	<ul> <li>"Rise in size and cost [with the] apparent inability to achieve a commensurate improvement in the scope and overall quality"</li> </ul>
	<ul> <li>"Unproductively duplicative" collection systems and a failure in forward planning to coordinate the allocation of resources</li> </ul>
1976	Church Committee
	DCI should have program authority, and monies for national intelligence should be appropriated to the DCI rather than agencies
	Recommended second DDCI for Community Management
	State must improve overt collection of economic and political data
	Raised issue of separating clandestine/covert ops from analysis
1992	Boren-McCurdy
	National Security Act of 1992 (not adopted, Defense opposed)
	<ul> <li>DNI, two DDNIs, consolidate DIA and INR analysts with CIA<sup>21</sup></li> </ul>

Figure 1. The US Intelligence Community has undergone a number of performance reviews since its inception. Graph taken from *The New Craft of Intelligence: Achieving Asymmetric Advantage in the Face of Nontraditional Threats*, by Robert David Steele.

Roemer, Gorton, Thompson, 2004, p. 339). The failure in imagination regards the IC's failure to view Osama bin Laden and his terrorist group, al Qaeda, as a real threat to the United States, as well as a failure to consider airplanes as weapons, despite warnings in the form of estimates entitled "Islamic Extremist Learns to Fly" (Kean et al., 2004, pp. 339-347).

The WMD Commission also found lack of imagination to be part of the intelligence failure (Silberman et al., 2005, pp. 147, 560). This was only a small part of the issue, however, as the Commission found much breakdown in the way of how analysts write

their estimates. Regarding prewar intelligence analysis and the overall findings on the Intelligence Community, the WMD Commission found:

- "a failure to communicate effectively with policymakers (Silberman et al., 2005, p. 3);
- finished intelligence that was loosely reasoned, ill-supported, and poorly communicated (Silberman et al., 2005, p. 12);
- too many analytic products that obscured how little the Intelligence Community actually knew about an issue and how much their conclusions rested on inference and assumptions (Silberman et al., 2005, p. 12);
- [that] the PDBs [President's Daily Brief] and SEIBs [Senior Executive Intelligence Brief], with their attention-grabbing headlines and drumbeat of repetition, left an impression of many corroborating reports where in fact there were very few sources (Silberman et al., 2005, p. 14);
- [i]n ways both subtle and not so subtle, the daily reports seemed to be "selling" intelligence (Silberman et al., 2005, p. 14);
- an Intelligence Community in which analysts have a difficult time stating their assumptions up front, explicitly explaining their logic, and, in the end, identifying unambiguously for policymakers what they do not know (Silberman et al., 2005, p. 389);
- that many of the most basic processes and functions for producing accurate and reliable intelligence are broken or underutilized (Silberman et al., 2005, p. 389);
- even when intelligence is available on electronic networks, the interfaces are clumsy and counterintuitive—far below the presentation of online publishers such as the Washington Post (Silberman et al., 2005, p. 417);
- the PDB sometimes includes excessively "snappy" headlines, which tend to misrepresent an article's more nuanced conclusions, and which are, in our view, unnecessary (Silberman et al., 2005, p. 420)."

From this, some of the WMD Commission's recommendations are as follows:

- "focus... on instituting changes to the Community's culture that will improve analytic performance (Silberman et al., 2005, p. 390);
- [a]nalytic "tradecraft"—the way analysts think, research, evaluate evidence, write, and communicate—must be strengthened. (Silberman et al., 2005, p. 12);
- increasing analyst training; ensuring that managers and budget-writers allot time and resources for analysts to actually get trained; standardizing good tradecraft practices through the use of a National Intelligence University;... ensuring that finished intelligence products are sufficiently transparent so that an analyst's reasoning is visible to intelligence customers (Silberman et al., 2005, p. 26);
- analytic expertise must be deepened, intelligence gaps reduced, and existing information made more usable—all of which would improve the quality of intelligence (Silberman et al., 2005, p. 24);

- [a]nalytic reasoning must be more rigorous and be explained in clearer terms in order to improve both the quality and credibility of intelligence (Silberman et al., 2005, p. 409);
- analysts should take pains to write clearly, articulate assumptions, consistently use caveats, and apply standard approaches to sourcing (Silberman et al., 2005, p. 409);
- [a] structured Community program must be developed to teach rigorous tradecraft and to inculcate common standards for analysis so that, for instance, it means the same thing when two agencies say they assess something "with a high degree of certainty" (Silberman et al., 2005, p. 409);
- [a]nalysts must assess the available information and place it in context. They must clearly and concisely communicate the information they have, the information they need, the conclusions they draw from the data, and their doubts about the credibility of the information or the validity of their conclusions (Silberman et al., 2005, p. 416);
- [t]he Intelligence Community must distribute its products more efficiently and effectively (Silberman et al., 2005, p. 417)."

#### Conclusion

It is clear, especially in the face of the September 11 and WMDs in Iraq intelligence failures that analysts in the USIC need to better understand the needs of decisionmakers and how best to communicate the results of their analyses. The IC also needs to standardize procedures throughout the Community to ensure analysts deliver these analyses in a clear, accurate and timely manner. In fact, standardizing parts of intelligence is one of the WMD Commission's recommendations:

"In addition to conveying disagreements, analysts must also find ways to explain to policymakers degrees of certainty in their work. Some publications we have reviewed use numerical estimates of certainty, while others rely on phrases such as 'probably' or 'almost certainly.' We strongly urge that such assessments of certainty be used routinely and consistently throughout the Community. Whatever device is used to signal the degree of certainty—mathematical percentages, graphic representations, or key phrases—all analysts in the Community should have a common understanding of what the indicators mean and how to use them" (Silberman et al., 2005, p. 419).

Yet as the IC "is a closed world, and many insiders admitted...that *it has an almost perfect record of resisting external recommendations*" (Silberman et al., 2005, p. 6), an adequate set of guidelines must be built upon extensive reviews of literature and commentary by decisionmakers, government entities, and academic professionals. This should not be too difficult.

For decades, decisionmakers have been hinting at a style of writing that they want to see in the reports they receive. The United States Intelligence Community simply has not been listening, or, when they have, it has been only under clear pressure to do so.

In the 1940s, US President Harry S. Truman said of intelligence estimates, "If it is not intelligent and understandable, it is useless" (Truman, 1956, p. 56).

In a 1964 article, Frank A. Knapp, Jr. writes "A top official of the Department of State...[pointed] out his concern over the abstruse style used in the reports which he received, [and] made a plea for the revival of the straightforward 'declarative sentence' and for direct expression of ideas" (Knapp, 1964, p. A1).

Ambassador Robert D. Blackwill, former head of the US Delegation to the NATO-Warsaw Pact negotiations, comments on what analysts can do to improve relationships with their decisionmakers:

"Customize intelligence papers and briefings to solidify the relationship. Many policy officials, overwhelmed by the volume both of their activities and of seemingly important information, will welcome specialized newsletters. They will welcome even one-page summaries of key events overseas." (Davis, 1995, A Program for the DI section, para. 11).

Further, regarding the value he put on customized information, Blackwill says, "I could not afford to read intelligence papers because this or that intelligence agency was entitled to produce them.... I could only read intelligence products tailored to help me get through my substantive schedule" (Davis, 1995, What Works, and What Does Not section, para. 3).

If decisionmakers are so adamant, then, in demanding analysts address their needs, how can the IC determine exactly what decisionmakers want? The best way is simply to listen to them, and the next section does exactly that by dissecting years of commentary from decisionmakers from the Business, Law Enforcement and National Security sectors.

# Intelligence Decisionmakers: What They Say They Want

As seen in the prior section, much of the United States' past intelligence failures have resulted from a communication breakdown – a breakdown somewhere in the transmission of getting information out of the analyst's head, onto paper, and into the *decisionmaker's* head – exactly as the analyst intended. Why is this so? Is it the fault of the analyst – perhaps for not explaining clearly enough their judgments? Is it possibly the decisionmaker's fault, for being intelligence-illiterate? More likely, it is that analysts simply do not know how to write effectively for their exacting readers.

What is it, then, that intelligence decisionmakers want from analysts? For *decades*, high-level officials have been dropping subtle – and not-so-subtle – hints at what they want and need from analysts. Few analysts, apparently, have been listening.

This section summarizes articles, interviews, and recollections of forty-one of decisionmakers from the National Security Intelligence (NSI), Business Intelligence (BI) and Law Enforcement Intelligence (LEI) fields that span over five decades.<sup>3</sup> This fresh look at what decisionmakers want from their intelligence analysts provides clear guidance as to how analysts can attempt to breach the communication divide.<sup>4</sup>

# **Fulton T. Armstrong**

In *Ways to Make Analysis Relevant but Not Prescriptive*, Fulton T. Armstrong, a career officer at the CIA's DI and member of the National Intelligence Council (2003), essentially lays out a 6-point plan for analysts to follow in order to "stay clear of minefields" (Armstrong, 2002, So What Can We Do? section, para. 1):

- "follow the policy and political debates" to know where officials stand on national interests and to "consciously assess the different categories into which US interests fall" (Armstrong, 2002, So What Can We Do? section, para. 1);
- "embrace available tradecraft tools", as these will "help give meaning to our non-bias mantras" (Armstrong, 2002, So What Can We Do? section, para. 3);
- use all-source information to build context, add value from the analyst, and more deeply understand the policy, political and bureaucratic agendas against an issue (Armstrong, 2002, So What Can We Do? section, para. 4);
- use alternative analysis, assessing evidence from multiple perspectives (Armstrong, 2002, So What Can We Do? section, para. 5);

<sup>&</sup>lt;sup>3</sup> These individual perspectives are organized in alphabetical order without reference to the decisionmaker's "discipline" – National Security, Business or Law Enforcement.

<sup>&</sup>lt;sup>4</sup> It is worthy to note up front that decisionmakers are unlikely to be - at least overtly – concerned with minute format details such as font size and margin width. Such minutiae are reserved for analysts to comprehend and contend with. These details, however, are important in helping analysts meet the goals that decisionmakers lay out for them (See Chapter 4: Section Three).

- balance warning intelligence, which typically reflects a narrow understanding of US national interests and is not actionable, with opportunity intelligence, which reflects policymakers' "complex array of interests" (Armstrong, 2002, So What Can We Do? section, para. 6); and,
- avoid the potentially harmful "value judgments and value-laden labels that assume a certain interpretation of our national interests" (Armstrong, 2002, So What Can We Do? section, para. 7).

To summarize his main points, Armstrong argues that it is the analyst's job to provide straightforward, realistic intelligence, free from personal opinion, biases, interpretations, or qualifiers (2002, The Bottom Line section, para. 1). "The Intelligence Community should provide policymakers with analytic products that are realistic and reflect a range of legitimate interpretations of events and their implications for the United States" (Armstrong, 2002, The Bottom Line section, para. 2). It is up to the policymaker, conversely, to "make value judgments" and interpret intelligence in a certain way (Armstrong, 2002, The Bottom Line section, para. 1).

# **Aqute Research**

Focusing solely on providing BI on new technologies, Aqute Research aims to give their customers high quality products that suit their needs. Aqute emphasizes and promises:

- tailored market research (Aqute Research, What makes Aqute different from other market research companies? section, para. 2);
- the highest quality writing that is clear and decisive (Aqute Research, What makes Aqute different from other market research companies? section, para. 3);
- "sharp analysis and plain language" so "you hear what you need to hear and your customers understand what you want to tell them" (Aqute Research, What makes Aqute different from other market research companies? section, para. 4);
- value for the money (Aqute Research, What makes Aqute different from other market research companies? section, para. 4);
- brevity (Aqute Research, What we don't do section, para. 1);
- honesty, where "If we think that your strategy will flop and you're making a big mistake, we will say so, even if it annoys you" (Aqute Research, What we don't do section, para. 2);
- suggestions, options and opportunities (Aqute Research, What we don't do section, para. 2).

Aqute, very bluntly, promises to work with their customers and be open to anything: "If you want it, we can do it for you. And if you would like your market research delivered with a side order of fries, that's fine too" (Aqute Research, What we don't do section, para. 3).

## Walter D. Barndt, Jr.

In *New to Competitive Intelligence? 10 Tips for Survival and Success*, Walter D. Barndt, Jr., former Society of Competitive Intelligence Professionals (SCIP) director and retired professor of management at The Lally School of Management, offers ten tips to analysts new to Competitive Intelligence (CI) who "want to hit the ground running" (1999). He notes that analysts should:

- know and be involved with their decisionmakers;
- identify and develop relationships with both their company's informal information network and its experts;
- have a 'champion';
- educate the company as to CI's role; and
- know the discipline's literature.

According to Barndt, analysts often neglect the crucial step of Tip #2, "Know what is expected of you" – or, clarify your requirements, for fear that asking questions causes them to appear unconfident or uninformed (1999, Tip #2 section, para. 1). However, decisionmakers may actually *expect* analysts to ask good questions – a practice that shows the analyst is interested and enthusiastic (Barndt, 1999, Tip #2 section, para. 1).

Tip #3 directs analysts to profile their decisionmakers and know their preferences. For example, who wants what, why, and "When and how do they want information?" (Barndt, 1999, Tip #3 section, para. 1). Further, Barndt advocates analysts utilize the decisionmaker's language: "What language do they use to talk about "strategy" or "intelligence"? Use their language, not yours" (Barndt, 1999, Tip #3 section, para. 1).

Barndt's Tip #4 notifies analysts to their company's "informal network of information sources" that decisionmakers both trust and rely on, and advises them to learn who the

"Know what kind of intelligence is expected of you and by whom."
Walter D. Barndt, Jr. (1999, Tip #2 section, para. 1)

players are, how it works, and how to tap into it (Barndt, 1999, Tip #4 section, para. 1).

Further, Tip #5 directs analysts to find the experts within their company and exploit their knowledge. Experts are "those people in the company who know more about what and who is important to your business than any other insider – with expertise about any topic of relevance, whether it's

the key competitor's sales force, technology development, patent searches, Justice Department lawyers, or leisure preferences in Bulgaria" (Barndt, 1999, Tip #5 section, para. 1).

Analysts should develop "an informal but mutually beneficial relationship" with a connected, respected individual to 'champion', counsel and help them professionally in their job (Barndt, 1999, Tip #6 section, paras. 1-2).

Barndt feels that CI analysts need to educate the players in their company – customers, employees, investors, rivals, and suppliers – about what CI is and what CI analysts do (1999, Tip #7 section, paras. 1-2). He advocates tailoring the communication medium – either one-way (emails, memos, articles) or two-way (in-person meetings) communication – to the type of audience receiving it and the nature, possibly sensitive or controversial, of the message (Barndt, 1999, Tip #7 section, paras. 3-4).

Know and keep a library of a wide array of the most important discipline-related literature, and share with colleagues any that would be of interest to them, is Tip #8 (Barndt, 1999, Tip #8, para. 2).

## Richard A. Best, Jr.

In the March 22, 2005 update of the Congressional Research Service (CRS) *Intelligence Issues for Congress*, Richard A. Best, Jr. mentions multiple times Congress' concern over recent intelligence failures and its desire for better quality of analysis. "Members have criticized the performance of the Intelligence Community... Improved analysis, while difficult to mandate, remains a key goal" (Best, 2005, Summary section, para. 6).

Best notes four ideas that support the call for better-trained analysts. First, as Best writes, "The ultimate goal of intelligence is accurate analysis" (2005, p. 10). Second, there is currently a "severe shortage of trained analysts", and the problem, which is

"The ultimate goal of intelligence is accurate analysis." Richard A. Best, Jr. (2005, p. 10, para. 3)

"already acute in some agencies", should worsen with "the likelihood of significant retirements in coming years" (Best, 2005, p. 13). Third, Congress has "increased funding for analytical offices since 9/11 and the Intelligence Reform Act of 2004 contains a number of provisions designed to improve analysis" (Best, 2005, p. 10). Fourth, the quality of

analysis will likely remain "a focal point of congressional interest in the Intelligence Community" as WMD proliferation remains a major policy concern (Best, 2005, p. 13).

#### Robert D. Blackwill

In a series of highly insightful interviews with Jack Davis (1991-93), US Ambassador Robert D. Blackwill, former National Security Council (NSC) member and Principal Deputy Assistant Secretary at the State Department, stresses the importance of a close decisionmaker-analyst relationship, claiming that, for analysts, this is the key to getting officials to read their reports. Describing his experience as a decisionmaker with intelligence analysts, Blackwill suggests methods for analysts to improve this

relationship. To summarize Blackwill's points, Davis writes: "[T]o meet their responsibilities in promoting the national interest, intelligence professionals have to become expert...on serving the self interest of policy professionals by providing specialized analytic support" (1995, Some Key Points section, para. 6).

As a policy official, Blackwill admits "he never read DI [Directorate of Intelligence] papers.... 'Because they were nonadhesive....' [T]hey were written by people who did not know what he was trying to do and, so, could not help him get it done" (Davis, 1995, A Shaky Start section, para. 1).

In his own "self-interest", Blackwill formed close relationships with DI analysts so they would provide him the customized intelligence he needed. He singled out Agency

"[T]he Intelligence Community does 90 percent of foreign affairs analysis in the USG [US Government]. Policy choices are made and policy actions are taken whether or not the expertise of analysts is brought to bear."

US Ambassador Robert D. Blackwill (Davis, 1995, Intelligence and Policy Tribes section, para. 8) analysts for the job because, in his opinion, they knew enough about the history of their topic to interpret current information that came in (Davis, 1995, From Mutual Ignorance to Mutual Benefit section, para. 9). He also "appreciated...immensely" that his EURA analysts "worked late into the night in Washington" to deliver a daily cable to him "first thing in the morning European time" when he was abroad (Davis, 1995, What Works, and What Does Not section, para. 18).

Blackwill did not appreciate, however, text that "read like an NID [National Intelligence Daily] article" after going through "too many levels of review" (Davis, 1995, What Works, and What Does Not section, para. 19). What he wanted instead "was the analyst's unvarnished response to my questions" (Davis, 1995, What Works, and What Does Not section, para. 19). Having a close professional relationship with their decisionmaker encourages this "frankness" (Davis, 1995, Politicization Not an Issue section, para. 7).

To summarize Blackwill's many points:

- policy officials are extremely busy and usually cannot afford to read information or intelligence that is not directly relevant to them (Davis, 1995, A Shaky Start section, para. 1; Davis, 1995, What Works, and What Does Not section, para. 3);
- policy officials tend to be unaware of the services analysts have to offer, and analysts tend to be unaware of their decisionmaker's job and what type of intelligence they need (Davis, 1995, A Shaky Start section, para. 4);
- good analysts will take the time to introduce themselves to their decisionmaker, explain what they can do, determine their customer's needs exactly, and offer to provide their decisionmaker with customized intelligence reports

- DI analysts' strength lay in their ability to use historical perspective to interpret current information (Davis, 1995, From Mutual Ignorance to Mutual Benefit section, para. 9);
- decisionmakers usually appreciate when analysts go out of their way to gratify them and accommodate their busy schedule (Davis, 1995, What Works, and What Does not section, para. 18);
- analysts should provide policy officials with clear, straightforward responses to their questions (Davis, 1995, What Works, and What Does Not section, para.
   19), analysts can achieve this by forming a close relationship with their decisionmaker (Davis, 1995, Politicization Not an Issue section, para. 7);
- analysts must have the "intellectual courage" to be completely honest with their decisionmakers about issues, informing them when "something is not working, or is not going to work" (Davis, 1995, Politicization Not an Issue section, para. 8);
- it is important for analysts to, where appropriate, provide their decisionmaker with a variety of options, making clear how the official can "get to the least bad outcome" (Davis, 1995, Politicization Not an Issue section, para. 9);
- analysts must break down and simplify problems for their decisionmaker, avoiding "words and complexities" (Davis, 1995, Intelligence and Policy Tribes section, para. 3).

# Scott D. Breckenridge

In *The CIA and the US Intelligence System* (1986), Scott D. Breckenridge, twenty-six year CIA veteran, discusses the political nature of decisionmakers and outlines the roles of intelligence analysts.

Breckenridge suggests that decisionmakers may be so fixed to their own notions that they "inject some bias into their reactions", "misread what they are told" and may strongly prefer a different conclusion (Breckenridge, 1986, p. 145). He also hints at the fact that decisionmakers are extremely busy: "The policymakers and planners do not, themselves, have the time to sift through the mass of material that must be reviewed and digested" (Breckenridge, 1986, 154).

"The more extensive a man's knowledge of what has been done, the greater will be his power of knowing what to do."
Benjamin Disraeli (Breckenridge, 1986, p. 144)

As for analysts, Breckenridge argues they should be able to use their knowledge of history to put current events in context. "Knowledge of the past and present provides a sense of the continuing course of events; therefore, intelligence analysts are expected not only to identify key aspects of a current situation, but also to point to the future significance of what is

known" (Breckenridge, 1986, p. 144).

When "the facts are not complete", analysts must remember that there are limits to their predictions, and must make clear to the decisionmaker the distinction between their hypothesis and what is actually fact (Breckenridge, 1986, p. 144). "This point is critical if the highest professional standards are to be applied to intelligence work", as the most controversy lies where analysts make judgments that transcend the facts (Breckenridge, 1986, p. 144).

## Analysts should:

- be objective (Breckenridge, 1986, p. 145); and
- make any differing viewpoints clear to the decisionmaker which "not incidentally, guards both the quality and integrity of the analytical process" (Breckenridge, 1986, p. 145).

# **Business Intelligence**

Business Intelligence, a United Kingdom-based management research firm, designs their reports primarily to be practical, independent, and authoritative (Business Intelligence: Home, Independent, authoritative and inspiring section, para. 1).

A testimonial for one of the firm's reports praises their accessible format and relevant information: "It has a style that is easy to read and understand, is packed with practical case studies and will provide invaluable steps for all practitioners embarking on the journey" (Business Intelligence, Testimonials section, para. 10).

Another testimonial appreciates a report's customer-focus, and again, relevance: "Once again Business Intelligence has published a report that provides its audience with exactly what they want; top-class thinking on an important management tool balanced with the practical experience of those who have used the mechanism to improve the way they do things" (Business Intelligence, Testimonials section, para. 11).

# David L. Carter, PhD

In 2004, David L. Carter, PhD of Michigan State University created a report on behalf of the US Department of Justice to help law enforcement bodies understand the LEI function and form their own LEI unit. While the report does not specifically discuss best practices for intelligence analysts, it does offer some useful information.

The report stresses two main issues: that community-policing efforts maintain strong ties with the community, and that LEI efforts ultimately – or eventually – serve national security efforts. Carter does not feel that law enforcement's counterterrorism role will diminish the community relationship at all. In fact, he asserts, "the need is even greater to maintain a close, interactive dialogue between law enforcement and the

community" (Carter, 2004, p. 39). The information that LEI analysts provide law enforcement is essential to building and maintaining this important relationship (Carter, 2004, The Flow of Illicit Commodities section, p. 46).

Overall, LEI functions to support the entire precinct: "ILP [Intelligence-Led Policing] provides strategic integration of intelligence into the overall mission of the organization" (Carter, 2004, Intelligence-Led Policing section, p. 41).

#### LEI stresses:

- ethical decision making. (Carter, 2004, Ethical Issues section, p. 43);
- prevention (Carter, 2004, The Similarity to CompStat section, p. 44); and
- timeliness; that is, providing feedback to patrol officers so the latter are "consistently informed of potential problems or threats that may be encountered during the course of their shift" (Carter, 2004, The Similarity to CompStat section, p. 44).

Law Enforcement Intelligence analysts have four general requirements; they should identify:

- who the threats are;
- "who's doing what with whom";
- the threat's modus operandi (MO); and
- what actions to take to counter the threat (Carter, 2004, The Similarity to CompStat section, p. 45).

Successful LEI efforts to assist officers and keep the public safe depend on:

- effective intelligence analysis;
- "effective information dissemination to street officers"; and
- "trusting relationships and effective communications between law enforcement and community members" (Carter, 2004, The Flow of Illicit Commodities section, p. 46).

Further, because the demographics that police stations across the US serve vary widely, each has its own specific requirements, especially regarding public awareness. LEI analysts must therefore tailor their information to the unique needs of its precinct (Carter, 2004, Public Education section, p. 47).

As LEI bodies across the US become increasingly integrated to assist the Federal Bureau of Investigation (FBI) in its country-wide security efforts, Carter notes that "common STANDARDS, POLICIES, and PRACTICES will help EXPEDITE intelligence sharing" (2004, Perspective section, p. 3).

#### Ronald V. Clarke & John Eck

Step forty-nine of Ronald V. Clarke and John Eck's *Become a Problem-Solving Crime Analyst in 55 Small Steps* is "Tell a clear story" (Clarke & Eck, n.d., 49: Tell a clear story section).

Clarke and Eck state that, to tell a clear story, and better assist decisionmakers, analysts need to know their audience and their questions (Clarke & Eck, n.d., 49: Tell a clear story section). The finished product must address the decisionmakers' particular needs in both form and content (Clarke & Eck, n.d., 49: Tell a clear story section).

For form, analysts should choose a layout appropriate to the type of problem, findings, and the decisionmaker's needs (Clarke & Eck, n.d., 49: Tell a clear story section). They may choose to tailor them, when necessary, according to the time available to complete the work (Clarke & Eck, n.d., 49: Tell a clear story section).

For a clearly written product, analysts should avoid including extraneous details, and ensure the argument flows logically and that there are no gaps in the logic (Clarke & Eck, n.d., 49: Tell a clear story section).

Based on the SARA (Scanning, Analysis, Response, Assessment) process, the product should help answer four basic questions:

- scanning "what is the nature of the problem?" (Clarke & Eck, n.d., 49: Tell a clear story section);
- analysis "what causes the problem?" (Clarke & Eck, n.d., 49: Tell a clear story section);
- response "what should be done about the problem?" (Clarke & Eck, n.d., 49:
   Tell a clear story section); and
- assessment "has the response brought about a reduction in the problem?" (Clarke & Eck, n.d., 49: Tell a clear story section).

Under Step 31, Clarke and Eck caution analysts to make sure to answer the "five 'W' (and one 'H') questions" – that is, who, what, when, where, why, and how (Clarke & Eck, n.d., 31: Check you have answered the five 'W' (and one 'H') questions section).

# **Counterdrug Intelligence Executive Secretariat**

The Community Model: A Basic Training Curriculum for Law Enforcement Analysts, prepared by the Counterdrug Intelligence Executive Secretariat, is comprised of seventeen exportable curriculums for basic law enforcement analyst training. One course, Intelligence Report Writing, introduces students "to basic summarization and intelligence report writing skills" (Counterdrug, 2003, p. 15-1).

The course teaches analysts to:

- "summarize pertinent information";
- "identify key facts";
- "prepare a summarization report";
- "determine appropriate analytic report format"; and
- "prepare a gist and comment report" (Counterdrug, 2003, p. 15-1).

Some fundamentals of summarization and reporting include:

- answering "who, what, when, where, why and how";
- writing a "summary sentence per paragraph";
- including all of the facts; and
- keeping it simple (Counterdrug, 2003, p. 15-3).

Analysts should choose their report's format type based on:

- the type and purpose of the analysis;
- the audience;
- the data that they analyzed; and
- the timeframe they have to work with (Counterdrug, 2003, p. 15-6).

The layout and structure of the report is as follows:

- fact pattern ("summary of the facts of the case as you know them, including possible charges");
- description of data received;
- summary and detail of records;
- conclusions; and
- recommendations (Counterdrug, 2003, p. 15-6).

# Douglas H. Dearth

Douglas H. Dearth, Senior Adjunct Faculty, UK Defence [sic] Intelligence and Security Centre, in *National Intelligence: Profession and Process*, emphasizes a close relationship between analysts and their decisionmaker, especially when forming the intelligence requirement:

"The articulation of the requirement is the most important part of the process, and it seldom is as simple as it might seem. There should be a dialogue concerning the requirement, rather than a simple assertion of need. Perhaps the customer knows precisely what is needed and what the product should look like. Perhaps... not. Interaction is required: discussion between ultimate user and principal producer. This is often difficult due to time, distance, and bureaucratic impediments, not to mention disparities of rank, personality, perspectives, and functions" (Krizan, 1999, Converting Customer Needs Into Intelligence Requirements section, p. 13).

#### Bill Fiora

President of Outward Insights Bill Fiora's *Writing Intelligence Reports That Get Read* is a highly readable, concise and clear account of the differences between high school writing demands and those of the intelligence profession, as well as how analysts can write decisionmaker-friendly reports. He stresses that while academics tend to demand reports according to a certain number of pages, business leaders "typically prefer reports that are short and to the point. Unfortunately, many CI practitioners still follow the rules that they learned in school" (2002, para. 2).

Fiora identifies three main mistakes that intelligence professionals make:

- in "The Big Build Up", writers slowly build their case and put conclusions at the end, despite the fact that "most readers will stop reading before they get to" that point (Fiora, 2002, para. 5);
- while intelligence audiences tend to be interested in recent events, writers follow "The Time Line" approach, putting events in chronological order (Fiora, 2002, para. 6); and
- the "Look How Hard I Worked" approach (also known as "Look How Much I Know About This Subject") produces "a long, unfocused product" when the author "has collected a huge amount of information, and can't bear to leave any of it out" (Fiora, 2002, para. 7).

Fiora states, "one of the best ways to learn how to write intelligence reports is by

"One of the most underappreciated skills in the intelligence profession is the ability to write clear and concise reports. Without this skill, however, you risk losing your reader's interest and wasting your hard work and analysis."

Bill Fiora (2002, para. 1)

studying your competition—the newspapers and magazines that top executives read every day"(2002, para. 8). These articles attract decisionmakers because they "provide timely, relevant information that is clearly presented", and analysts should have the same goals (Fiora, 2002, para. 8).

Intelligence writers should put the bottom line up front –

in the topic sentence of each paragraph – and arrange these in decreasing order of importance (Fiora, 2002, para. 9). Further, creating an effective executive summary is simple by rewording the topic sentences of the first few paragraphs, provided they remain in the same order (Fiora, 2002, para. 11). "If this first section is compelling enough, the reader will continue in order to learn more" (Fiora, 2002, para. 10).

Good topic sentences should both tell the reader "what?" and put this fact in context by explaining what it means, that is, "so what?" (Fiora, 2002, para. 12). The decisionmaker then knows "what is happening and why it is important" (Fiora, 2002, para. 13).

When the report is complete, Fiora suggests analysts test themselves to see if the title, executive summary and topic sentences is effective (2002, para. 14). Each should answer "what?" and "so what", and should convey to the decisionmaker exactly what the report is about simply by reading one of these parts (Fiora, 2002, para. 14).

Lastly, this journalistic writing style forces writers to include only the most relevant facts, making it easier to cut extraneous information and by extension, keeping the report short (Fiora, 2002, para. 16).

"[W]riting a well-crafted intelligence report is a lot of work. Good writing often means good re-writing.... The results, however, are well worth it" (Fiora, 2002, para. 17).

#### Gartner, Inc.

Gartner, Inc. is one of the largest BI firms providing intelligence on the global Information Technology (IT) industry. Their goal is to support their customers, and they achieve this through:

- in-depth analysis;
- actionable advice (Gartner, Inc.: About Gartner, About Gartner section, para. 1);
   and,
- independent research (Gartner, Inc.: Our Business, Our Business section, para.
   1).

Gartner prides itself on its clients' trust in them, due to the company's "rigorous standards that safeguard the independence and objectivity of our research and advice" (Gartner, Inc., About Gartner section, para. 2). With USD 853 million in revenue (2003), and over 10,000 clients in 75 global locations, Gartner is clearly doing something right for their decisionmakers (Gartner, Inc., About Gartner section, para. 2).

It is likely that the company's success rests on their decisionmaker-focused products. Gartner offers to deliver their findings "through several different media depending on a client's specific business needs, preferences and objectives" (Gartner, Inc.: Our Business, Our Business section, para. 1).

#### James P. Hanrahan

James P. Hanrahan, writing "from the perspective of CIA's Deputy Director for Intelligence" in 1967, advocates tailored, concise, and bottom-line-up-front intelligence writing in order to properly serve high-level decisionmakers. First, Hanrahan states an analyst should find out what the decisionmaker needs; the best way is simply to ask them (Hanrahan, 1967, p. 2). From here is "a discussion of technique, and form, and formula" (Hanrahan, 1967, p. 7), where analysts tailor their reports best to meet the official's needs:

"For example, when Mr. Komer received his special assignment to concentrate on South Vietnamese problems we asked him how, as a former member of the Office of National Estimates, he felt we could best meet his needs. He asked for a periodic summary of economic and pacification developments in South Vietnam, information that tends to get buried in the welter of military reporting, and we now have such a weekly publication tailored especially for him" (Hanrahan, 1967, p. 2).

In some instances, as Hanrahan explains below, decisionmakers do not read estimates when they are not, in fact, customized. He found himself in such a situation when President John F. Kennedy received the Central Intelligence Bulletin, which met his predecessor's needs: "It had been expressly asked for by President Truman. Then it was specially adapted to meet President Eisenhower's needs, and although we had tried to alter it further it did not suit President Kennedy's style and he did not read it" (Hanrahan, 1967, p. 5).5

"One must be alert to the changing needs of the policy maker, and be ready to meet them." James P. Hanrahan (Hanrahan, 1967, p. 11, para. 4) Besides content, analysts tailor format to individual decisionmakers: "The form in which it [the report] is processed is determined by the requirements of the consumers" (Hanrahan, 1967, p. 7).

Hanrahan stresses brevity as "the overriding virtue" (Hanrahan, 1967, p. 4). In the event that no length is specified, "we write as much as we think required to do the

job, no more", and then have a reviewer "cut it in half" (Hanrahan, 1967, p. 4). Further, the core conclusions and judgments are most important; "argumentation can come later"

<sup>&</sup>lt;sup>5</sup> What Kennedy *did* want was a concise summary of all issues written on a small card that he could carry with him to read at his convenience. In response to Kennedy's request, Dick Lehman created the President's Intelligence Check List, or PICL (pronounced "pickle") – a small, almost square card that fit into Kennedy's breast pocket (Kovar, 2000, Editor's note section, para. 1).

(Hanrahan, 1967, p. 4). Whether or not the analyst achieves brevity, they should "put a summary up front" (Hanrahan, 1967, p. 4).

#### **Bonnie Hohhof**

Bonnie Hohhof, Director of CI Information and research for the Society of Competitive Intelligence Analysts (SCIP), provides comprehensive guidelines for writing and delivering successful intelligence reports in her presentation *Building Better Deliverables*.

Hohhof advocates tailoring format according to the customer's "preferred information absorption style (print, electronic, auditory, visual)" (Hohhof, 2005, slide 9) and

"Most managers have perfected the art of scanning or speed reading documents." Bonnie Hohhof (2005, slide 13) choosing the form based on who requested the product, what is most useful to them, and the time the analyst has to produce it (Hohhof, 2005, slide 10). Analysts should also ensure that the form allows the decisionmaker to understand the message (Hohhof, 2005, slide 5), and have "cascading research deliverables", that is, an executive summary leading to an abridged report, and finally the full report (Hohhof, 2005, slide 10).

To produce effective reports, Hohhof advises analysts to:

- "write for the scan reader", structuring the product "from shallow to deep detail", as most of the target audience will only skim the document (Hohhof, 2005, slide 13);
- put the bottom line up front "if the first sentence is not relevant, they will quit" (Hohhof, 2005, slide 13);
- "highlight relevant results" (Hohhof, 2005, slide 4);
- only include the relevant information (Hohhof, 2005, slide 6);
- maintain a consistent, conversational tone (Hohhof, 2005, slide 14);
- use short sentences and paragraphs (Hohhof, 2005, slide 14);
- "use a style guide; avoid jargon" (Hohhof, 2005, slide 14);
- draw the reader's attention using "bullet points, subheads, bold text, white space,
   [and] callout boxes" (Hohhof, 2005, slide 14);
- employ "graphics to present complex ideas and relationships" (Hohhof, 2005, slide 14);
- provide examples and case studies (Hohhof, 2005, slide 14);
- put information into context and "identify conflicts in 'facts'" (Hohhof, 2005, slide 6):
- include all information, providing "alternate meanings or patterns" and identifying biases and preconceptions (Hohhof, 2005, 7);
- include options, alternative approaches or next steps (Hohhof, 2005, slide 7);

- "tell a story to put into perspective" (Hohhof, 2005, slide 14);
- "write for the audience" (Hohhof, 2005, slide 15);
- remember the rule of thumb "the more senior the audience, the shorter the report" (Hohhof, 2005, slide 15);
- write reports in pyramid form, with the key findings in the first sentence, followed by a one-paragraph summary abstract, an executive summary, the detailed findings, appropriate bibliography, and any appendices or glossaries (Hohhof, 2005, slide 19); and
- brand the work to make it visually distinguishable, consistently employing the same colors and "feel" throughout reports (Hohhof, 2005, slide 21).

Further, analysts should follow up with the decisionmaker regarding the product to determine its good and bad qualities and whether it proved useful (Hohhof, 2005, slide 37).

Prior to delivering the intelligence to the decisionmaker, however, Hohhof suggests analysts ensure the product is still timely and relevant (2005, slide 39), puts the recommendations first, has "visuals to capture and summarize key concepts" (2005, slide 42), and meets the decisionmaker's current needs (2005, slide 38).

# **International Association of Crime Analysts**

Created in 1990, the International Association of Crime Analysts (IACA) helps crime analysts across the globe improve their skills and form valuable networks. The Association also aids LE agencies in taking full advantage of their analysis and advocates LEI performance standards (IACA: About the IACA, 2005, About the IACA section, para. 1).

According to IACA, an analyst's role is to support their decisionmakers in effectively carrying out their job: "Analysts need to know how to assist officers and command staff with ways to work smarter and to organize information" (IACA: Brochure, 2005, Announcing the IACA Training Conference! section, p. 2).

Examining some sample crime analysis products makes obvious the fact that LEI decisionmakers are similar to BI decisionmakers: they both prefer graphic-heavy documents.

Figure 2 is the Overland Park Police Department's 2000 Public Information Sheet (OPPD, 2000, p. 1). The document, designed for a possibly uninterested public, quickly highlights notable crimes in the area in an easy to read format.

The map in Figure 3, part of the Spokane Police/Sheriff Department's Weekly Crime Bulletin, displays graphically seven days worth of burglary, vehicle theft, vehicle

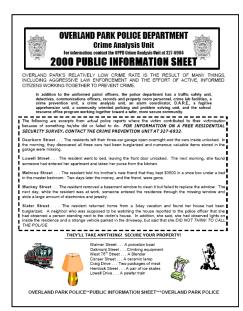


Figure 2. Important information in the OPPD's PIS is easily accessible. Source: OPPD, 2000, p. 1.

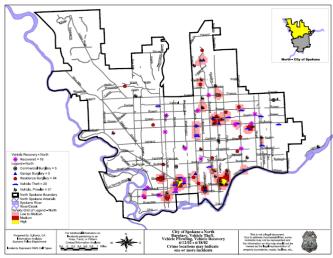


Figure 3. This SP/SD bulletin quickly directs its readers to the highest-density crime areas – those marked in yellow. Source: Kuntz, 2002, p. 3.

prowling, and vehicle recovery (Kuntz, 2002, p. 3). Overlaying population density offers a revealing

picture that anyone can figure out: most crimes occurred in the highest-density areas (marked in yellow).

# Interpol

Interpol considers analysts' central task is "to help officials...deal more effectively with uncertainty, to provide timely warning of threats, and to support operational activity by analysing [sic] crime" (Interpol, n.d., Introduction section, para. 4).

The organization divides LEI into two parts, operational/tactical and strategic analysis, which differ according to the consumer and the level of detail included. The former typically informs ground level operations in much detail and is immediately actionable (Interpol, n.d., Introduction section, para. 5). Higher-level decisionmakers, conversely, tend to receive strategic analysis, which has a longer-term forecast. Strategic intelligence provides early threat warnings and assists senior decisionmakers in straightening their priorities and readying their organizations for future issues (Interpol, n.d., Introduction section, para. 5).

# Lowell E. Jacoby

In the preface to *DIA At The Creation 1961-1965: Origination Documents of the Defense Intelligence Agency*, Lowell E. Jacoby, Vice Admiral, USN and DIA Director, comments on the importance of timely intelligence: "Good intelligence, delivered at the right time and place, can mean more than the difference between victory and defeat. It can also mean life or death for members of our Armed Forces who fight our wars on land, sea, in the air, and not in space." (Allen & Shellum, 2002, p. xi).

#### Loch K. Johnson

Loch K. Johnson, who has both overseen and written extensively on intelligence, states in *America's Secret Power*, "The most valuable contribution the CIA can make to American democracy...is to seek and report the truth to policymakers" (1989, p. 59). According to Johnson, "Two major weaknesses...have interfered with this essential mission" (1989, p. 59), namely, distortions in how analysts report the information and

"The toughest assignment for the CIA is 'to give honest assessments and still keep the policymaker reading."" Robert M. Gates, in America's Secret War how decisionmakers receive it. To protect the US against intelligence failures, such as Pearl Harbor, "The best shield seemed to be information about possible dangers that was timely, well coordinated, and accurate. Of utmost importance was the requirement of impartiality: hard evidence free of emotion, political calculation, or other distorting biases" (Johnson, 1989, p. 60).

On the other hand, a number of "scandals" relating to analysts supplying their decisionmakers with "intelligence to please", that is, telling them what they want to know, served to deteriorate the trust which decisionmakers came to have in the estimates they received. "[I]n 1983, staff aides on the congressional intelligence committees grew suspicious of CIA estimates on Central America as further examples of intelligence to please" (Johnson, 1989, p. 62). This distrust, coupled with the inclination of many policymakers to disregard intelligence that did not appeal to them, only fuels the ineffectiveness of the US intelligence community. Johnson cites Robert M. Gates, former Deputy Director of the CIA: "It has been my experience over the years...that the usual response of a policymaker to intelligence with which he disagrees or which he finds unpalatable is to ignore it" (1989, p. 63).

#### **Sherman Kent**

Sherman Kent, former Chairman of the Bureau of National Estimates, in *Strategic Intelligence for American World Policy*, makes the manufacture of intelligence products analogous to that of a common good or service. With this, he describes intelligence as "an organization engaged in the manufacture of a product (knowledge) out of raw materials (all manner of data) and labor (highly skilled, but not practical in the business sense of the word)" (Kent, 1951, p. 76).

Concerned with product quality and customer satisfaction, Kent noted that each product "must be up to standard", and that "only by maintaining the quality can it [the product] expect continuous acceptance" (Kent, 1951, p. 76). He notes a number of things that

"Like many a producer of consumers' goods, intelligence will have its greatest marketing success when its product bears the unmistakable signs of superior research, cautious development, sound design, and careful production." Sherman Kent (1951, p. 76)

relate to product quality – all of which sum up to mean "tailor the product to the decisionmaker".

Packaging: "It must be packaged in a multitude of ways to suit the diversities of consumer demand", where consumer demands range from "semi-finished form", to a bulky, finished form, to "the one-page summary of the world situation in words of two syllables or less" (Kent, 1951, p. 76).

Content: A product, "in its very inner make-up must the product both direct and reflect the fluctuations of consumer taste" (Kent, 1951, p. 76).

Further, using their experience with and knowledge of their decisionmaker, analysts will be able to anticipate or even generate their consumer's demand for a new product (Kent, 1951, p. 76).

In Sherman Kent's Final Thoughts on Analyst-Policymaker Relations, Jack Davis (2003) summarizes Kent's post-retirement lectures and handwritten manuscripts on the analyst-policymaker relationship. According to Kent, analysts face a "central professional challenge of simultaneous service to two demanding masters—analytic integrity and policy clients" (Davis, 2003, para. 2). To help ensure effective ties between the two, Kent laid out general paths to take based on two different types of analysis: warning analysis and intentions analysis (Davis, 2003, paras. 3-5).

"Sherman Kent...was long seized with the importance, and difficulty, of establishing effective relationships between intelligence analysts and policy officials."

Jack Davis (2003, para. 1)

What the former lacks is "mutual understanding and trust", which leads analysts to mistrust their policymaker's motives and findings (Davis, 2003, para. 4). The latter, intentions analysis, is the opposite. Here, analysts and policymakers tend to think too much alike, and so the challenge is "to introduce more openminded argumentation to the estimative process…via solid alternative reasoning" (Davis, 2003, para. 5).

A selection of Kent quotes, meant to inform analysts of the warning intelligence consumer's (or *Warnee*, as Kent coins) world, is applicable in general and appear here in full:

- "Realize that the policymaker is no dope. He reads as much intelligence as he has time for—especially in his own area of concern" (Davis, 2003, Warning Analysis: The Danger of Too Distant a Relationship section, para. 30).
- "Realize that intelligence [that is, the intelligence collector], proud of its nuggets and wanting recognition for them, passes them around long before any final evaluation or synthesis by analysts is possible" (Davis, 2003, Warning Analysis: The Danger of Too Distant a Relationship section, para. 31).
- "In such a way, intelligence encourages its consumers to be junior grade intelligence officers. Sometimes they get to be adept indeed" (Davis, 2003, Warning Analysis: The Danger of Too Distant a Relationship section, para. 32).
- "Next, realize that the Warnee [i.e. the policymaker] has a full time job and is not looking for extra work or needless interruption of his regular duties. His circuits are already overloaded" (Davis, 2003, Warning Analysis: The Danger of Too Distant a Relationship section, para. 33).

To sum, Kent argues that policymakers are well informed – indeed, at times better informed than their analysts – and have little time for irrelevant interruptions.

# Lyman B. Kirkpatrick, Jr.

Even back in the 1960s, intelligence analysts noticed the importance of formatting to get their reader's attention, as Former Executive Director of the CIA Lyman B. Kirkpatrick notes in *The Real CIA* (1968, p. 42).

He tells the story of one day comparing the different daily intelligence reports that came in, as they clearly reflected their author's personality and character:

"Some G-2s were aggressive, thorough, and imaginative. Others were more inclined to be cautious and restrained and put out the minimum necessary material. The competition for attention even reached the point that there was a good bit of 'Madison Avenue' in the method of presentation of the reports, with colorful maps, terrain studies, statistics – all part of the report in order to impress the readers" (Kirkpatrick, 1968, p. 42).

The picture Kirkpatrick further paints of the Intelligence Community back in the '60s largely reflects that which decisionmakers desire now. If he describes it correctly, intelligence was:

- objective (Kirkpatrick, 1968, p. 264);
- "based on the total knowledge available to the United States government" (Kirkpatrick, 1968, p. 264);

- did not "deprive any of the departments of any of their established rights and responsibilities" (Kirkpatrick, 1968, p. 264);
- did not "inhibit their presenting a differing view at either the intelligence or policy level" (Kirkpatrick, 1968, p. 264); and
- an unrestrained voice in the government (Kirkpatrick, 1968, p. 264).

# Frank A. Knapp, Jr.

In his 1964 Studies in Intelligence article, *Style and Stereotypes in Intelligence Studies*, Frank A. Knapp, Jr. identifies shortcomings in intelligence writing and offers hints to improve it. Most notable of his insights is the following paragraph:

"A truism about any form of communication is that effectiveness depends on not only what is said but how it is said. Format and style are perhaps even more important in intelligence than in most forms of writing. A keen analysis of any given event [or] development can be mangled in the process of presentation, for example by burying the critical portions in superfluous detail. The emphasis on brevity and clarity in intelligence reports implicitly recognizes that the key officials who are of influence in the formation of our foreign and defense policies are under a variety of pressures and demands, that they can devote only a limited part of their time to the great volume of intelligence materials which flow across their desks. Aware of this competition for time and attention, all intelligence producers would like to feel that their efforts are presented as sharply, clearly, and effectively as possible" (Knapp, 1964, p. A1).

Further along, Knapp advises taking "negative action" with intelligence writing; that is, ridding text of weaknesses or defects. He specifically mentions removing "as many as possible of the popular clichas [sic] that saturate the content of most government and journalistic reporting" (Knapp, 1964, p. A4, para. 2). In his blunt style, Knapp goes on to say, "Clarity, accuracy, brevity, and directness are among the cardinal qualities of

"Clarity, accuracy, brevity, and directness are among the cardinal qualities of intelligence writing and indeed of any good nonfiction..."

Frank A. Knapp, Jr. (Knapp,

1964, p. A4, para. 2)

intelligence writing and indeed of any good nonfiction.... Shopworn pretentious phraseology can be distracting if not actually repelling to a reader" (Knapp, 1964, p. A4, para. 2).

Knapp calls for a back-to-basics approach to word choice, appearing especially exasperated regarding analysts' use of extravagant words, which "is often superfluous embroidery" (Knapp, 1964, p. A4, para.

3). "[A]re we really being more sophisticated in saying that a cargo is 'onloaded' or 'offloaded?' The English-speaking peoples survived for many centuries with plainvanilla load and unload, and I have yet to get through my obtuse skull the advantage in the new coinage" (Knapp, 1964, p. A4, para. 3).

#### Lisa Krizan

Lisa Krizan, a Department of Defense researcher, in *Intelligence Essentials For Everyone* (1999), describes intelligence as "value-added actionable information tailored to a specific customer" (Creating Intelligence section, p. 39). Intelligence therefore must be strictly decisionmaker-focused: "every activity in the intelligence process must be related to a requirement, otherwise it is irrelevant" (Krizan, 1999, Assessing and Exchanging Best Practices section, p. 4).

Krizan stresses close decisionmaker-analyst interaction throughout the entire intelligence cycle – from creating efficient intelligence requirements to customer feedback that helps ensure future products are the best they can be.

She discusses the process of turning a decisionmaker's needs into an actual intelligence requirement, stating that before analysts get to work, they must determine the "Who, What, When, Where...Why" and How (Krizan, 1999, Converting Customer Needs Into Intelligence Requirements section, p. 13). "[T]hese questions form the basic framework for decisionmakers and intelligence practitioners to follow in formulating intelligence requirements and devising a strategy to satisfy them" (Krizan, 1999, Converting

"[E]ffective analysis depends upon a good working relationship between the intelligence customer and producer." Lisa Krizan (1999, Customer Focus section, p. 35, para. 2) Customer Needs Into Intelligence Requirements section, p. 13). The analyst-decisionmaker interaction required for this step is necessary. "A good working relationship between the two parties at this stage will determine whether the intelligence produced in subsequent stages actually meets customer needs" (Krizan, 1999, Generating

Intelligence Requirements section, p. 17).

In a good decisionmaker-analyst relationship, both players are in "nearly direct, daily contact" (Krizan, 1999, Ensuring that Requirements Meet Customer Needs section, p. 19), understand each other's views on intelligence, and the decisionmaker provides feedback on production quality that leads "to better definition of future intelligence problems and requirements" (Krizan, 1999, Generating Intelligence Requirements section, p. 17). "Free interaction among the players will foster agreement on intelligence priorities and result in products that decisionmakers recognize as meaningful to their agendas, yet balanced by rigorous analysis" (Krizan, 1999, Generating Intelligence Requirements section, p. 17).

Decisionmakers should base their feedback on six criteria:

- accuracy "Were all sources and data free of technical error, misperception, and hostile efforts to mislead?" (Krizan, 1999, Customer Feedback and Production Evaluation section, p. 47);
- objectivity "Were all judgments free of deliberate distortions and manipulations due to self-interest?" (Krizan, 1999, Customer Feedback and Production Evaluation section, p. 47);
- readiness "Are intelligence systems responsive to the existing and contingent intelligence requirements of customers at all levels of command?" (Krizan, 1999, Customer Feedback and Production Evaluation section, p. 47);
- relevance "Was information selected and organized for its applicability to a customer's requirements, with potential consequences and significance of the information made explicit to the customer's circumstances?" (Krizan, 1999, Customer Feedback and Production Evaluation section, p. 47);
- timeliness "Was intelligence delivered while the content was still actionable under the customer's circumstances?" (Krizan, 1999, Customer Feedback and Production Evaluation section, p. 47); and
- usability/accessibility "Was all production issued in a form that facilitated ready comprehension and immediate application? Were products compatible with the customer's capabilities for receiving, manipulating, protecting, and storing the product?" (Krizan, 1999, Customer Feedback and Production Evaluation section, p. 47).

According to Krizan, intelligence generally seeks to:

- be independent and objective (Krizan, 1999, Assessing and Exchanging Best Practices section, p. 17);
- include facts, "considered judgment, and probability, but not prescription" (Krizan, 1999, Assessing and Exchanging Best Practices section, p. 17); and
- identify "the factors at play, and how various actions may affect outcomes", rather than provide operational advice (Krizan, 1999, Assessing and Exchanging Best Practices section, p. 17).

Intelligence "tends to be packaged in standard formats" and may not be timely due to "its methodical approach" (Krizan, 1999, Assessing and Exchanging Best Practices section, p. 17).

Analysis, at the very least, should include all relevant information, which the analyst should explain and interpret, and then, ideally, "reach successfully beyond the descriptive and explanatory levels to synthesis and effective persuasion" – or estimation (Krizan, 1999, Analysis section, p. 29).

Analysts should "tailor both the content and delivery of the intelligence to the customer" (Krizan, 1999, Emphasizing the Customer's Bottom Line section, p. 40).

Intelligence products must put the bottom line up front (BLUF), focusing on the analysis' results and making their significance evident "through sound arguments geared to the customer's interests" (Krizan, 1999, Emphasizing the Customer's Bottom Line section, p. 40). BLUF applies to any medium of expression and not simply to written documents (Krizan, 1999, Emphasizing the Customer's Bottom Line section, p. 40).

Krizan identifies three key features of intelligence products:

- timeliness, in both the time required to deliver the product and its usefulness to the decisionmaker at a given moment (Krizan, 1999, Features section, p. 42);
- scope, or "the level of detail or comprehensiveness of the material contained in the product" (Krizan, 1999, Features section, p. 42); and
- periodicity, or "the schedule of product initiation and generation" (Krizan, 1999, Features section, p. 42).

Arguing that technology is changing the production landscape, Krizan outlines many different formats that analysts can disseminate their intelligence in, ranging from the formal to informal: "electrical messages, hardcopy reports,... briefings"; video broadcasts, "live daily 'newscasts,' or canned documentary presentations" (Krizan, 1999, Packaging section, p. 44).

Above all, the product's format affects how well the customer receives it, and "personal touch can make a positive difference" (Krizan, 1999, Packaging section, p. 44). Everything, from the level of formality to the amount of text and graphics, should match the decisionmaker's preferences" (Krizan, 1999, Packaging section, p. 44). If analysts do not tailor the product to their interests, the decisionmaker simply may not read it.

#### Walter Laquer

In *A World of Secrets: The Uses and Limits of Intelligence*, Walter Laquer, Chairman of Georgetown University's International Research Council of the Center for Strategic and International Studies, states, "Even excellent intelligence is of little consequence unless its most senior consumers, the president and secretaries of state and defense, take cognizance of it and believe in its accuracy (1985, p. 71). He believes a trusting relationship between these high-level officials and the Director of Central Intelligence (DCI) is essential.

This trust, "if not a perfect personal chemistry", can rely on "the understanding on the part of policy makers about" (Laquer, 1985, p. 71):

- "the way in which intelligence can help them" (Laquer, 1985, p. 71);
- "what it cannot accomplish" (Laquer, 1985, p. 71); and
- "the ability of intelligence to get important information across" (Laquer, 1985, p. 71).

Even throughout the remaining decisionmaker-analyst levels, Laquer advocates close contact between the two (1985, p. 107).

Laquer raises two interesting points. First, it is a failure of communication that is responsible for decisionmakers' criticism of intelligence for its "irrelevance to immediate policy considerations", and not the analyst's "inability to produce relevant intelligence" (Laquer, 1985, p. 107). This point seems to encourage a close decisionmaker-analyst relationship. Second, many decisionmakers also criticize intelligence products for not making their conclusions and warnings overtly clear. Decisionmakers call such products "overcoordinated,' [sic] [as they present] only a

Close contact on all levels between intelligence and policy makers is necessary for psychological as well as other reasons.

Walter Laquer (1985, p. 107)

vague, meaningless level of consensus that conceals many of the most important arguments" (Laquer, 1985, p. 107).

While they should certainly not hold back important information, Laquer cautions analysts against giving decisionmakers too wide a range of options and speculations. Instead, he advises that decisionmakers want a forthright explanation of developments based on the analyst's informed judgment, "and a range of likely

future developments based on the best information currently available" (Laquer, 1985, p. 106).

#### Thomas C. Lawrence

Intelligence professionals learn tips on writing effective CI newsletters – or, to generalize, any intelligence document – in *Writing A Successful Competitive Intelligence Newsletter* by Thomas C. Lawrence, managing director of Watchdog Market Research, LLC.

Lawrence outlines a number of helpful practices throughout the process, ranging from start-up to dissemination:

- define the audience in order to make the product target-specific and effectively meet their needs (2005, p. 18);
- utilize feedback and comments from readers to tailor the content further to suit their demands (2005, p. 19);
- exploit all-source information, add value to the information through analysis, offer references or links to outside sources, and add another analytical

- dimension by including results of studies attained through various analytical methodologies (2005, p. 20);
- evaluate quality of sources and information by verifying it against at least two other sources (2005, p. 20);
- cite sources to give credit to the original source and to add credibility to the summary and analysis (2005, p. 20);
- disseminate the intelligence in a timely manner, tailoring the product's arrival to the type of information it contains (e.g. weekly news summaries vs. semiannual strategic forecasts) (2005, p. 20);
- regarding packaging, tailor the product's format and delivery vehicle to the audience (2005, pp. 20-1);
- make the document accessible with a catchy, one-line-only headline that draws
  the reader's interest and helps them scan the document; also use bullets and/or
  one-paragraph summaries to achieve this (2005, p. 21);
- put the most important and interesting information up front (2005, p. 21);
- use a neutral, factual writing style for technical information and general news reporting, and a conversational style for analyses; regardless, maintain the audience's interest to ensure they read or scan the entire document (2005, p. 21);
- "consider abbreviating industry reports and providing either full reference information or web links to the full-report" (2005, p. 21); and

brand the product with an appropriate and relevant name and logo (2005, p. 22).

## Mark M. Lowenthal

In his second edition of *Intelligence: From Secrets to Policy*, Mark M. Lowenthal, a twenty-seven-year veteran of the Intelligence Community and adjunct professor at Columbia University, discusses, among other things, the importance of decisionmaker involvement in the intelligence process, as well as what makes for good intelligence analysis and analysts.

Regarding requirements, Lowenthal writes that decisionmakers should know exactly what they want from their analysts and should clearly convey their needs to them (Lowenthal, 2003, p. 43). He postulates, however, that decisionmakers tend to assume their analysts know what they want, and do not do this. When Lowenthal asked a former Secretary of Defense "if he ever considered giving his intelligence officers a more precise definition of his needs, he said, 'No. I assumed they knew what I was working on'" (Lowenthal, 2003, p. 43). Filling this communication gap requires analysts to "assume this task on [their] own" (Lowenthal, 2003, 43). Further, decisionmakers should be giving their analysts continual feedback, answering questions such as what was and was not useful, and which areas need continuing, increased or decreased emphasis (Lowenthal, 2003, p. 50).

With a wide array of dissemination formats available, Lowenthal advocates tailoring intelligence forms to their audience, reflecting "an understanding of the needs and preferences of the policymakers", and adjusting them as administrations change (2003, 49).

Lowenthal touches on the fact that decisionmakers are very busy, and intelligence products need to make themselves stand out amongst the "daily flood of information" (2003, p. 87). Analysts can do this in two ways, the first – and least preferred – method is to highlight the "unique nature of the intelligence sources", although this de-emphasizes the value that the analyst adds (Lowenthal, 2003, p. 87). The second method is to add value to the analysis so it "stands out on its own merits" (Lowenthal, 2003, p. 87). Analysts add value through:

- timeliness (Lowenthal, 2003, p. 87);
- products tailored to the decisionmaker's needs (Lowenthal, 2003, p. 87); and
- objective analysis (Lowenthal, 2003, p. 87).

Further, good qualities in an analyst include good writing and, notably, brevity (Lowenthal, 2003, p. 90), as "shorter papers will usually best longer papers in the competition for policymakers' attention" (Lowenthal, 2003, p. 91).

In the event that analysts have differing views on a product, Lowenthal mentions that they can engage in "footnote wars", where the analysts express their concerns through footnotes (2003, p. 97). When the analyst does not have enough information, it is important for them to convey to their decisionmaker how much they *do not* know (Lowenthal, 2003, p. 100). Analysts must also make clear their uncertainties, avoiding "weasel words" like 'maybe', 'perhaps', 'on the other hand', etc. (Lowenthal, 2003, pp. 100-01).

Good intelligence has four key points. It:

- is timely (Lowenthal, 2003, p. 108);
- is tailored (Lowenthal, 2003, p. 108);
- is digestible/accessible (Lowenthal, 2003, p. 109);
- clearly conveys the known and unknown (Lowenthal, 2003, p. 109); and, to sum, it
- avoids politicization (Lowenthal, 2003, p. 105);
- avoids "weasel words" (Lowenthal, 2003, pp. 100-01); and
- expresses differing viewpoints among analysts, where possible (Lowenthal, 2003, p. 97).

## Douglas MacEachin, Jr.

The key to the analyst-decisionmaker relationship, according to Douglas MacEachin, Jr., the CIA's former chief manager of current intelligence, is "packaging, timing, and building rapport" (Johnson, 1989, p. 97). "Good packaging is vital," he says. "You must focus the policymaker's attention. They are busy. They like pictures and graphs" (Johnson, 1989, p. 97).

# Joseph W. Martin

Joseph W. Martin in his Studies In Intelligence article, *What Basic Intelligence Seeks to Do*, opens a discussion of the objectives that "basic intelligence" – or, "information capable of being so organized that it can be turned to readily" (Martin, 1970, p. 104) – "should aim at and of the standards by which effective performance in it should be judged" (Martin, 1970, p. 103).

There are three main criteria for excellence in a reference document:

- systematic organization, where data appears "in a pattern that most people consulting the document will find compatible with their own particular interests in turning to it" (Martin, 1970, p. 107);
- clarity and precision in effectively conveying information to the reader, using language that is "crisp and clear" (Martin, 1970, pp. 107-108); and,
- realistic in what it seeks to include, that is, including both the facts and judgments the decisionmaker should know, and those the analyst can effectively communicate in the document, considering length and time constraints (Martin, 1970, p. 108).

These criteria "rest on the premise that the essential problem of the reference document is...effective communication" (Martin, 1970, p. 105).

"It is too often forgotten that the primary task of intelligence is to get a fact or judgment from the inside of a specialist's brain to the inside of a layman's..."

Joseph W. Martin (1970, p. 107, para. 3)

Part of this communication is not only good writing, but also an easy format. Readers should be able quickly to find desired information and receive "a little guidance on where to find further data on the same subject" (Martin, 1970, p. 106).

Simple writing will fill decisionmakers' desire "plain information and not entertainment" (Martin, 1970, p.

106). Further, as many decisionmakers want only "specific facts or judgments about some part of" an issue (Martin, 1970, p. 106), analysts should avoid trying to provide the whole picture.

Martin postulates two mechanisms for ensuring excellence in research documents, the second of which reiterates his idea that "constantly remembering that its [the

document's] critical problem is effective communication-reaching the reader's mind, not merely the page in front of his eyes" (Martin, 1970, pp. 112-13).

He also mentions some quick tips and tricks analysts may use to better their intelligence products and meet their decisonmaker's "desires for speed and convenience" (Martin, 1970, p. 113):

- using graphics may "significantly shorten the time a senior official takes to absorb needed information" (Martin, 1970, p. 113);
- many consumers may prefer a more "fanned-out, outline type of presenting basic data" versus solid paragraphs of text (Martin, 1970, p. 113);
- detailed indexing can "save a great deal of a reader's time" (Martin, 1970, p. 113); and,
- a "generous use of headings and subheadings", worded specifically to "aim the reader's interests" also ensures speed and convenience (Martin, 1970, p. 113).

#### **Don McDowell**

In Strategic Intelligence: A Handbook for Practitioners, Managers and Users, Don McDowell, a strategic intelligence consultant and teacher, discusses skills and characteristics that are necessary for intelligence analysts to possess, such as the requirement that all products are relevant to the decisionmaker and the need for analysts to maintain professionalism.

"If the client or customer cannot see the significance of the assessment, warning or forecast in terms of his or her responsibilities, then small wonder that it is the reputation of the intelligence unit/analyst that suffers as a result"

McDowell (1998, pp. 203-4)

McDowell clearly stresses the need for analysts to make their products relevant to the decisionmaker. Not to do so, consistently, "may well impact adversely on its [the intelligence unit's] image and standing in the organisation [sic]" (McDowell, 1998, p. 204). Analysts must also explain their analyses and "links" in such a way that "they are obvious to every reader" (McDowell, 1998, p. 204). An intelligence product that clearly and persuasively "sells" its decisionmaker-relevance helps to preclude a

decisionmaker's ignoring or trivializing it (McDowell, 1998, p. 204). McDowell notes that, when decisionmakers do not clearly articulate their requirements, it is the analyst's responsibility to best determine what is or is not appropriate (1998, p. 204).

Intelligence can best prove its worth by producing timely, accurate and relevant assessments (McDowell, 1998, p. 204).

It is important that analysts maintain a high degree of professionalism. One way to do so is by maintaining intellectual rigor, where analysts ensure they openly and

thoroughly complete research projects without letting their own, already vast knowledge preclude them from delving deep into new material (1998, p. 212).

McDowell also highlights some "special challenges for the analyst", noting that analysts must accept certain facts about their job. For one, "being expert and professional carries with it the responsibility to confront challenge and deal with it" (McDowell, 1998, p. 214). Second, decisionmakers will not always be receptive to analytic conclusions. In this case, the analyst maintaining "a sense of conviction that the research has been thoroughly carried out and the conclusions reached are appropriate, is dependent upon not only courage but a sure knowledge that intelligence is about speculation" (McDowell, 1998, p. 214).

"Only by raising their awareness can the intelligence unit be assured that the analysts will avoid the traps in being slave to conformist thought, precedent and imposed cultural values – all enemies of objective analysis."

Don McDowell (1998, p. 215)

One of an analyst's trademarks is that they must think "in leaps and bounds" and not be limited to standards or conformity (McDowell, 1998, p. 215). Following from this, McDowell underscores the importance of creative thinking for these professionals: "[I]ntelligence relies on clever interpretation of data and events to identify what might be happening, what might occur next, who might be involved, and what could be the impact of such actions. This is a service provided to decision makers to allow them to focus on problem-solving and opportunity-taking" (1998, p. 215). He notes the need for analysts to learn to think creatively and for supporting organizations to embrace the skill (1998, p. 216).

It is "necessary...for the culture that surrounds intelligence practice within an organisation [sic] to change (if needed) to allow for a spirit of creativity to emerge and prosper" and to create "an atmosphere that accepts that creativity is not the enemy of logic, and that imagination does not replace process" (McDowell, 1998, p. 216). "[C]reative thinking is akin to learning to better use a particular organ or muscle, in this case the brain, and teach it to comfortably adopt new tricks" (McDowell, 1998, p. 216).

#### Carmen A. Medina

Carmen A. Medina of the DI's Office of Policy Support, in *The Coming Revolution in Intelligence Analysis*,<sup>6</sup> argues that policymakers are actually well informed creatures, sometimes receiving raw intelligence reports before their analysts do (Medina, 2002,

<sup>&</sup>lt;sup>6</sup> In response to Medina's article, Steven R. Ward wrote *Counterpoint to "The Coming Revolution in Intelligence Analysis"*: *Evolution Beats Revolution in Analysis*, also published in Studies in Intelligence, and found at <a href="http://www.cia.gov/csi/studies/vol46no3/article04.html">http://www.cia.gov/csi/studies/vol46no3/article04.html</a>. Ward contends that Medina's "article's main failing is that its primary contentions fly in the face of history and recent feedback from our consumers and Agency leadership" (para. 3).

Analysis that Fits the New Environment section, paras. 2-4). With this in mind, analysts

"DI managers have realized that the specific interests of customers must have greater weight in determining what to do on any given day."
(Medina, 2002, The Current Model section, para. 3)

need to rethink their old assumptions regarding interaction with their customers, who now "need the greatest help understanding non-traditional intelligence issues" (Medina, 2002, Analysis that Fits the New Environment section, para. 5).

Medina lays out a plan that emphasizes quicker, lessformal intelligence products that turn away from current intelligence reporting and, in responding to

decisionmaker feedback, tackle the hard questions and ideas that require keen insight and knowledge.

Meeting 21st century policymaker demands means the DI analyst:

- understands current developments, "but only as the necessary foundation for its real contribution to policymakers" (Medina, 2002, Analysis that Fits the New Environment section, para. 6);
- specializes "in complex analysis of the most difficult problems" (Medina, 2002, Analysis that Fits the New Environment section, para. 6);
- focuses on their decisionmaker's hardest questions (Medina, 2002, Analysis that Fits the New Environment section, para. 6);
- identifies new policymaking opportunities and warns first "of discontinuities that could spell danger" (Medina, 2002, Analysis that Fits the New Environment section, para. 6);
- shifts focus from tracking current developments to responding to their policymaker's needs and feedback (Medina, 2002, Analysis that Fits the New Environment section, para. 8);
- tackles "the hard questions" from policymakers, de-emphasizing current intelligence products (Medina, 2002, Analysis that Fits the New Environment section, para. 9);
- thinks beyond producing finished intelligence to engaging in less-formal information-sharing such as emails and phone calls (Medina, 2002, Analysis that Fits the New Environment section, para. 11);
- models the "Centers", like the Counterterrorism Center, who spend more time "doing individual tasks that meet very specific customer needs" than producing finished intelligence (Medina, 2002, Analysis that Fits the New Environment section, para. 12).

One of the most striking points is Medina's contention that analysts should shift from traditional, formal products to informal, as-needed reporting:

"[S]uch products often cannot keep pace with events or even with information sources. DI officers who deal frequently with customers...report that many products short of finished intelligence often satisfy the needs of policymakers. These include annotated raw intelligence, quick answers to specific questions, informal trip reports, and memoranda of conversation.... As anyone who has done a recent tour at a US Embassy knows, most of the real scoop on world events is now exchanged in informal e-mails and telephone calls" (Medina, 2002, Analysis that Fits the New Environment section, para. 11).

#### Marilyn B. Petersen

Criminal Analyst Marilyn B. Petersen's *Applications in Criminal Analysis* stresses that analysts should be able to write clearly and effectively, and provides some guidance to follow. She notes that analysts must have four basic skills – the ability "to write, to talk, to organize materials, and to think" (Petersen, 1994, p. 11) and stresses the importance of packaging.

"Good writing skills are essential; these skills include more than good spelling, or grammar, or even knowledge of what to say. Good writing is a function of good organization. Knowing how to organize the facts in a logical manner is necessary in an intelligence report.... Analysts are able to organize facts and ideas in words as well as in graphics. The marriage of text and graphics is a necessary part of any public report, and analysts can best shepherd such projects. Analysts are trained to work with graphic professionals to assure a good product" (Petersen, 1994, p. 10).

In general, analysts should possess a broad knowledge of their subject that is "general enough to give them an understanding of the multifaceted criminal environment" (Petersen, 1994, p. 13).

Analysts need to adjust a report's content and writing style according to the targeted audience. Petersen notes, "Content should be a reflection of the targeted audience, the purpose of the report, and the desired outcome of the report" (1994, p. 63). Further, the writing style should parallel the readers': "The key to success in analysis is to write and communicate ideas at the level of the police or prosecutorial audience" (Petersen, 1994, p. 12). Brainstorming among all parties involved - the analyst, manager and decisionmaker – during the requirement-setting stage is one way to ensure "a tailored and informative report" (Petersen, 1994, p. 63).

Petersen mentions that intelligence products must be objective and clear. Objectivity allows the decisionmaker to know exactly what the information and analysis can tell them (Petersen, 1994, p. 61), and clarity allows them easily to differentiate between fact and conclusion (Petersen, 1994, p. 61).

"Good reports reflect strong analytical skills; they are well researched, well documented, well written, well organized, and well presented." Marilyn B. Petersen (1994, p. 61) The content and relative importance of topics covered guides the report's format. Many reports feature an executive summary that highlights the key findings and is located where the reader will notice it most (Petersen, 1994, p. 63). Generally, "overview sections or historical sections are placed near the beginning, while case results or research findings are placed in the middle and conclusions or future issues at the end" (Petersen, 1994, p. 63).

Petersen strongly advocates that analysts include in their reports graphical representations of their data: "graphics are more easily understood by the average person than statistics or statistical tables" (1994, p. 64).

Further, graphic design, or packaging, is also important, and includes "the way the cover looks as well as the way the inner pages are laid out, the typeface, and the pictures, chapter breaks, headlines, and so forth" (Petersen, 1994, p. 65). A report's poor layout may so influence the decisionmaker that they actually fail to read the content (Petersen, 1994, p. 65).

Lastly, in anticipating requests for further or more in-depth information regarding their reports, analysts should include all reference materials that contributed to it (Petersen, 1994, p. 67).

#### Martin Petersen

As a senior officer at the Central Intelligence Agency (CIA), political analyst and manager of CIA analysts, Martin Petersen asserts that a major challenge analysts must overcome is the issue of their credibility. Credible intelligence products are "relevant, timely, expert, objective, and informed", and have "impact" (Petersen, 2003, para. 3). To do both – establish credibility and have impact – analysts must first understand the nature of policymakers.

The key to policymakers regarding analysts as "credible sources of needed expertise" is the "ability to put the political behavior that policymakers see into a larger cultural and historical context—that they do not see—with enough sophistication to demonstrate that the context matters" (Petersen, 2003, Four Facts of Life section, para. 6).

Analysts must master six types of knowledge in order to have the insight required to recognize contextual importance, according to Petersen (2003, The Foundation of Credibility section, para. 1). These are as follows:

- know US history and culture, especially as it relates to the country or issue the analyst studies (Petersen, 2003, The Foundation of Credibility section, para. 2);
- learn the history of the country or issue in question as that country teaches it (Petersen, 2003, The Foundation of Credibility section, para. 5);
- "study the philosophy, literature, and key thinkers of whatever country they work on", especially for non-Western countries (Petersen, 2003, The Foundation of Credibility section, para. 2);
- understand the three key, culture-bound elements of power: "how power is acquired, the preferred means of wielding power, and the acceptable and unacceptable uses of power" (Petersen, 2003, The Foundation of Credibility section, para. 10);
- study popular culture to comprehend "what is considered fair and proper... obligations between people and groups, [and] characteristics that shape the attitudes, prejudices, and expectations of other nations (Petersen, 2003, The Foundation of Credibility section, para. 12); and,
- speak or read the country's language (Petersen, 2003, The Foundation of Credibility section, para. 14).

In the absence of hard evidence that would justify an analytic judgment, Petersen advocates the analyst make clear all assumptions and prior knowledge on which the judgment rests. "The problem is not the use of "suggests" or similar verbs, or even the judgment itself. The problem is that too often what is behind the judgment is invisible to the audience" (Petersen, 2003, From Credibility to Impact section, para. 2).

"[O]ur credibility is on the line every time we write or brief. We can strengthen credibility gradually over time, or we can lose it in a heartbeat." (Petersen, 2003, Final

Observations section, para. 2)

In *Toward a Stronger Intelligence Product: Making the Analytic Review Process Work*, Petersen asserts that the Intelligence Community should restructure the current review process in order to produce more effective finished intelligence products.

Petersen notes that arguments for and against a review process in general miss the key point: "The problem with the review process is...the quality of the review" (Petersen, 2005, p. 55). He argues for three levels

and three broad areas of review for each intelligence product, clarifying that 'editing' does not equal 'review', and 'levels' do not equal 'layers' (Petersen, 2005, p. 55). Each level examines increasingly broader issues, but all do so in the context of style, message and tradecraft (Petersen, 2005, pp. 55-6).

The first-level reviewer, usually the analyst's supervisor, who is closest to the product, focuses on "what is in the piece" (Petersen, 2005, p. 56), and ensures:

- spelling, grammar and other technical aspects are error-free (Petersen, 2005, p. 56);
- language is clear and crisp (Petersen, 2005, p. 56);
- the piece flows logically (Petersen, 2005, p. 56);
- facts are correct, sources are accurately described and the evidence is correctly characterized (Petersen, 2005, p. 56);
- the analyst has considered all relevant information and acknowledges alternate interpretations (Petersen, 2005, p. 56);
- key points are clear and supported by evidence, and assertions can be supported (Petersen, 2005, p. 56);
- the what/so-what for the US is "crystal clear in the title or the first sentence" (Petersen, 2005, p. 57);
- the knowns and unknowns are clear, as is the level of confidence (Petersen, 2005, p. 56); and
- if the product is inconsistent with previous analyses, the analyst has explicitly acknowledged and explained the reasons why (Petersen, 2005, p. 58).

"A rigorous, focused review process is the best guarantee that the style, message, and tradecraft of every piece of finished intelligence meet the standards that the mission requires."

Martin Petersen (2005, p. 55)

The second-level reviewer, typically the issue manager who is "well steeped in the subject matter but not as expert as the analyst or the firstline supervisor" is closer to the decisionmaker and "is better positioned to see how the piece at hand fits in with other work being done and how it relates to the audience's needs" (Petersen, 2005, p. 59). The review at this level focuses on "those things that underpin the piece" (Petersen, 2005, p. 59), and checks:

■ that key points are clear and supported by evidence, and assertions can be supported (Petersen, 2005, p. 56);

- for the assumptions that underpin the analysis and the "key drivers and variables" (Petersen, 2005, p. 56);
- whether the product is consistent with prior analysis (Petersen, 2005, p. 56);
- for information gaps, and to see whether the analyst has asked the right questions (Petersen, 2005, p. 56);
- that there is no confusing or technical jargon (Petersen, 2005, p. 56);
- that the what/so-what for the US is evident (Petersen, 2005, p. 56);
- that the analyst acknowledges alternate interpretations and makes clear the knowns, unknowns and level of confidence (Petersen, 2005, p. 56); and
- whether the document addresses the decisionmaker's needs (Petersen, 2005, p. 56).

The office-level manager or the organization's senior officer, "who is not expert but has a very broad context" (Petersen, 2005, p. 56), conducts the third-level review and

"focuses on the piece almost exclusively from the perspective of the audience" (Petersen, 2005, p. 60). This level clarifies that:

- the "what/so-what for the US" is evident (Petersen, 2005, p. 56);
- the piece is clear to non-expert and addresses the decisionmaker's concerns (Petersen, 2005, p. 56);
- there is no "confusing technical language or jargon" (Petersen, 2005, p. 56);
- key points are clear and supported by evidence, and assertions can be supported (Petersen, 2005, p. 56);
- the knowns, unknowns and level of confidence is clear (Petersen, 2005, p. 56);
- if the product is inconsistent with previous analysis, the analyst has clearly explained the reasons why (Petersen, 2005, p. 56); and
- the analyst has asked the right questions (Petersen, 2005, p. 56).

In short, Petersen's three-level review process would ensure that finished intelligence:

- is relevant to the decisionmaker and addresses their needs:
- provides the decisionmaker with all options and interpretations;
- uses clear writing and language and flows logically;
- is clearly supported by evidence;
- documents and accurately represents facts and sources;
- is transparent that is, the analyst makes clear the knowns, unknowns and level of confidence; and

was created with an accurate process, where the analyst asked the right questions and considered all information.

#### **Pyramid Research**

Besides the ready-made BI reports available from Pyramid Research's vast product catalogue, they can also "tailor our analysis to address your interests" based on their knowledge of the various industries (Pyramid Research: Home, Research Products section, para. 1).

Membership with the firm, customized solely to help "you to grow your business" (Pyramid Research home, Membership section, para. 1) offers a host of decisionmaker-friendly benefits, such as:

- a choice of both custom and pre-made research products
- access to analysts; and,
- intelligence that is "reliable, relevant and actionable" (Pyramid Research home, Membership section, para. 1).

Pyramid stresses the close analyst-decisionmaker relationship that it makes available to members. [Y]ou have a dedicated analyst who is accessible, friendly and motivated to help you succeed. Your analyst proactively looks for ways to add value, keeping you up to date on trends and events happening in the industries, regions and sectors in which you operate" (Pyramid Research: Inside Pyramid, Corporate Overview section, para. 4).

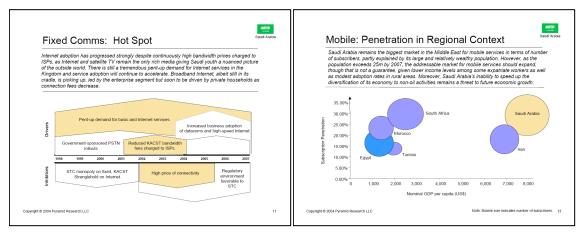


Figure 4. Pyramid fills its reports with clear, colorful visuals that highlight main points in the data. Source: Pyramid Research, pp. 11, 13.

Ubiquitous throughout Pyramid's reports are graphs, diagrams and charts. In fact, the graphic to text ratio in their high-priced (about USD 2,499) reports is roughly 1:1. Virtually every page of an 18-page report looks like those in Figure 4 (Pyramid Research, pp. 11, 13).

#### Kenneth Sawka

As is evidenced by the title, Kenneth Sawka, a vice president and director at Fuld & Company Inc., strongly advocates brevity in his article *Keep Your Message Short and Sweet*:

"Faithful readers of The Corner know my disdain for long, data-heavy intelligence reports. But lately, I've seen even more evidence of the power of short, direct, to-the-point analyses. It's become more and more clear to me that one of the key determinants of the "actionability" of intelligence lies with the way in which it is communicated.

"How many of you out there still insist on packaging your intelligence in long, death-by-Powerpoint presentations or reports? How many of you feel compelled to include in your intelligence products every bit of data you've collected and every piece of analysis you've done? And how many continue to be frustrated that your well-crafted, to-the-decision intelligence goes ignored by your managers?" (Sawka, 2000, paras. 2-3).

He tells the story of a client who "recently scored a major victory with the company's CEO largely because both the message and the" delivery mechanism were highly relevant to the decisionmaker's objectives, needs, "style, preference for receiving information, and decision-making manner" (Sawka, 2000, para. 4).

Further, despite having collected, evaluated and analyzed a massive amount of data, the client's analytic team decided to summarize the findings in only a one-page report that

"In many cases, how you say it is at least as important as what you say." Kenneth Sawka (2000, para. 1)

also included a "graphical depiction of their key findings" (Sawka, 2000, paras. 5-8): "[T]he CI team knew not to show all of its hard work to senior management to demonstrate how brilliant it was in reaching its conclusions. If it had, the key message...would have been lost" (Sawka, 2000, para. 7).

The team was able to make this production decision because they knew their decisionmaker – a CEO with only 6 months on the job who would not enjoy the findings and who therefore needed "a compelling, direct, convincing report that would grab his attention" (Sawka, 2000, para. 8). It was in a three-page follow-up document responding in detail to the CEO's questions that the analysts finally got a chance to show off their brilliance and hard work (Sawka, 2000, para. 9).

Sawka does not advocate short, concise analytic products at all times, however, and admits, "Sometimes a longer, more thoughtful report is needed, especially when the issues you are addressing are complex, uncertain, or involve many competitors or other players. But as a rule, shorter is better" (Sawka, 2000, para. 10).

With this, Sawka outlines five rules for communicating intelligence:

- "shorter is better", analysts will rarely need to communicate to the decisionmaker more than 15-20% of what they actually researched and analyzed (2000, para. 12);
- "follow the principles of expository writing" to ensure a simple, direct and to the point message that is actionable and avoids "rhetoric, creative writing, or prose" (2000, para. 13);
- "proofread, proofread, and then proofread again" to ensure the report is "error free, consistent, and professional-looking", with standard use of capitalization, consistent spelling, and a well formatted presentation (2000, para. 14);
- "make your reports appealing to the eye", for example, with eye-catching headlines, as "the most attractive package is the one that get [sic] picked up" (2000, para. 15); and

"swallow your pride", assuming that "less than 20% of the work you do on any intelligence issue will ever see the light of day" (2000, para. 16).

#### Neil J. Simon

President of Business Development Group, Inc., Neil Simon's *Cognition and Performance* applies educational theory to the CI process in order to determine how CI professionals can master the thinking skills necessary to perform better. He examines the cognitive aspect – about how people learn and apply knowledge – of Benjamin Bloom's 1948 study, *Taxonomy of Educational Objectives*, on the premise that "Good CI requires good thinking" (Simon, 2000, paras. 1-2).

According to Simon, successful CI requires that analysts put into practice all six elements of cognition (the thinking process):

- *Knowledge* analysts memorize and are able to recall material on their subject (Simon, 2000, Element #1 section, para. 1), such as "common terms, facts, methods, and procedures" (Simon, 2000, Knowledge Skills section, para. 1).
  - *Importance to CI* CI analysts must have a "foundation of basic knowledge about" their area of expertise, "mastery over the facts", and should know things such as what information to gather and what information sources are available and valuable to them (Simon, 2000, Element #1 section, para. 1).
- *Comprehension* analysts can "translate, interpret, and extrapolate information from basic knowledge" and "grasp or understand the meaning of the information" (Simon, 2000, Element #2 section, para. 1).
  - *Importance to CI* CI analysts must be able to summarize information, "extrapolate trends, estimate, generalize, provide examples,…contrast, associate, and extend ideas" (Simon, 2000, Comprehension Skills section, para. 3).
- Application analysts "use previously learned information in new situations", and gain further insight into this information by appropriately applying "rules, methods, concepts, principles, laws, and theories" (Simon, 2000, Element #3 section, para. 1).
  - *Importance to CI* a CI analyst "uses information and applies concepts and principles to new situations, applies laws and theories, and is able to use abstract ideas in particular concrete situations" (Simon, 2000, Application Skills section, para. 1).
- Analysis analysts break complex problems into parts to: find singularities; find differences or recognize relationships or patterns between parts; and uncover the hidden organizational structure underlying the information (Simon, 2000, Analysis Skills section, paras. 1-3).

- *Importance to CI* the "ability to analyze information and apply it to the customer's research questions" is one of the key contributions that CI analysts offer (Simon, 2000, Element #4 section, para. 1).
- Synthesis using their own creative skills, analysts combine multiple pieces of information to produce or invent a new "whole", such as a theme, product, concept, or plan (Simon, 2000, Synthesis Skills section, paras. 1-4).
  - Importance to CI CI analysts use their synthesis skills to invent new products (Simon, 2000, Element #5 section, para. 1), develop competitive edges (Simon, 2000, Synthesis Skills section, para. 2), create a plan or set of operations (Simon, 2000, Synthesis Skills section, para. 3), and, by generalizing from given facts, "develop 'what if' scenarios" (Simon, 2000, Synthesis Skills section, para. 4).
- Evaluation "based on earlier analysis and synthesis" and a set of criteria, analysts "judge or place a value on materials" (Simon, 2000, Element #6 section, para. 1).
  - Importance to CI analysts must be able to assess and compare products (Simon, 2000, Element #6 section, para. 1), "discriminate between ideas, assess the relative values of different theories, and make choices based on reasoned arguments" (Simon, 2000, Evaluation Skills section, para. 1).

Simon further argues that the greatest benefit of analysts who display all six of these

"CI practitioners must understand the expectations of their clients...and master the "thinking skills" necessary to fulfill those expectations." Neil Simon (2000, para. 1)

characteristics is their ability to assist clients in formulating requirements (Simon, 2000, Cognitive Development and its Impact on CI section, para. 3). "Most clients generalize their concepts when making requests and are not specific in stating what they want" (Simon, 2000, Cognitive Development and its Impact on CI section, para. 3). Good cognitive skills therefore allow analysts to deduce what the decisionmaker actually desires and can "help them to understand what they want, what they can get, and the available alternatives" (Simon, 2000, Cognitive

Development and its Impact on CI section, para. 3). This leads to "a more fulfilling and successful relationship" (Simon, 2000, Cognitive Development and its Impact on CI section, para. 3).

In *Whose Fault Is It, Anyway?*, Simon addresses the idea that intelligence departments should refrain from seeking a scapegoat when reacting to (CI) "intelligence failures" and instead choose to learn from them. He evaluates "organizational structure, organizational culture, management leadership practices, individual limitation, and...

bad CI practices" in order to assess "the blame culture that too often exists within an organization" (Simon, 2002, para. 3).

*Organizational structure* can create "situations where blame is a natural outcome" (Simon, 2002, para. 4). An organization that restricts information sharing and communication between its parts due to the existence of stovepipes, or "vertical 'chimneys'" is a classic example of this (Simon, 2002, para. 4).

Organizational culture "determines the expectations of work and behavior within the company", and its structure further "pre-determines many of the norms and mores within its culture" (Simon, 2002, para. 8). Combined, these two create a mandate where someone must be at fault "if someone does not 'make it", regardless of everyone's good intentions (Simon, 2002, para. 8).

*Management practices* that promote individuals based on performance breed a leadership that micromanages, according to Simon (2002, paras. 9-10). When something goes wrong, then, the leader – "who has had organizational endorsement

"Ultimately, this way of mutual working increases customer satisfaction." Neil J. Simon (2002, para. 20) noted by the promotions" – concludes, "someone had to mess something up" and hunts down the problem (Simon, 2002, para. 10). The intelligence unit "becomes a likely target for blame within the organization" for not providing the leader with the right information or guiding them in the right direction (Simon, 2002, para. 10).

Individual limitation divides into two cases of what Simon describes to be "personality factors" (2002, para. 11). In the first case, the decisionmaker fails to convey adequately their needs to the analyst and seeks "blame others for the shortcomings their own limitations have brought about" (Simon, 2002, para. 11). The customer then has a limitation of not thinking things through clearly (Simon, 2002, para. 11). In the second, a person's personality deficiencies, for example, "underlying complexes or insecurity, hostility, and/or extreme personalities", lead them to find a scapegoat for their own mistakes (Simon, 2002, para. 12). Here, the intelligence unit is equally vulnerable to attack as any other potential target (Simon, 2002, para. 12).

*Bad CI practices* simply mean that the organization faults the imperfect intelligence unit (that is, 'imperfect' in the context of 'everyone makes mistakes') for "letting the organization down, or worse, creating an organizational crisis" (Simon, 2002, para. 13).

To preclude the above 'blame games', Simon advocates that the intelligence unit discuss and clarify its task with the decisionmaker, and come to a clear, mutual agreement of the goals (2002, paras. 16-7). This also helps the unit to understand the decisionmaker's needs, and conversely, allows the decisionmaker to comprehend what the intelligence unit can offer (Simon, 2002, paras. 19-20). Simon strongly encourages decisionmaker

feedback, one more element that works to increase customer satisfaction (2002, paras. 20-1).

#### Value Line, Inc.

As one of the top providers of business *investment* intelligence, Value Line, Inc. has had almost seventy-five years to hone their products and services based on customer feedback. The company has therefore learned some tricks of the trade, which their mission statement reflects: "Our mission is to help investors get the most accurate and independently created research information available, in any format they choose, and teach them how to use it to meet their financial objectives" (What is Value Line? section, para. 1).

The statement highlights three main points. Value Line provides:

- accurate information;
- in a format tailored to the decisionmaker;
- with the aim of helping the decisionmaker achieve their goals.

That the firm prides themselves on their "trust, reliability, objectivity, independence" (What is Value Line? section, para. 2) and timeliness (What is Value Line? section, para. 3), hints these qualities are important to their decisionmakers. Further, Value Line willingly adapts to their customers' needs: "We continue to develop and refine our investment information and analysis to meet the changing needs of investors" (What is Value Line? section, para. 2).

The company also recognizes the value of providing not simply a lot of information, but doing it with brevity. As Value Line states, "No other service offers so much information in such a concise format" (What is Value Line? section, para. 8).

Value Line's one-page report (See Figure 5) on Oakley, Inc., a popular eyewear manufacturer (Part 3 – Ratings & Reports), reveals a layout designed for brevity – while simultaneously including all relevant information, accessibility, and bottom line up front (BLUF).

In a single page, the Value Line analyst provides no less than twenty distinct performance measures for Oakley, Inc. Instead of appearing jumbled and confusing, the layout is actually very decisionmaker-friendly. First, important parts of the text appear in bold so they stand out. Second, the format emphasizes using charts and graphs to get points across to the reader, rather than trying to explain the figures with words. And third, the decisionmaker can quickly scan to the page's top left corner to absorb the BLUF – three numbers that provide the analyst's overall rating of company performance on which decisionmakers will base their action.

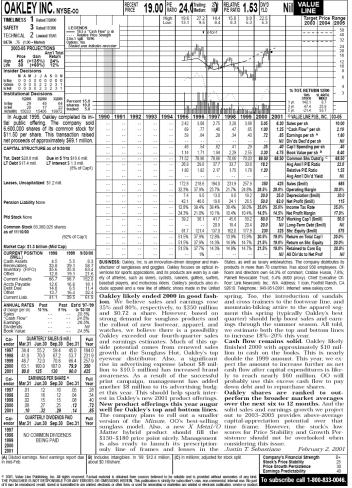


Figure 5. ValueLine's one-page layout successfully merges brevity and accessibility to include all information relevant to their customers. Source: Part 3 – Ratings & Reports.

#### **Constance Thomas Ward**

Constance Thomas Ward, a former CI manager at F. Hoffman-La Roche Ltd., relates rhetoric – skilled and persuasive communication – to competitive intelligence in *Myths About CI Report Writing*. She contends that, contrary to some definitions, good rhetoric "avoids argumentation and debate by aiming to" (Ward, 1999, para. 5):

- •"convince without seeming to argue" (Ward, 1999, para. 6); and
- •"compel without seeming to urge" (Ward, 1999, para. 6).

CI analysts, the "Chief Truth Tellers", must do their jobs objectively and report findings

fairly and impartially, "even though the purpose of that report is to persuade" (Ward, 1999, paras. 7-8).

Ward argues that the goal of CI reports "should be 'to move' people to action by showing them the Truth", and analysts must ardently write what is true (1999, paras.

"The success of a CI report hangs on the quality and the character of both the evidence and the writer. These criteria mattered in Aristotle's day, and they still matter in today's business world."

Constance Thomas Ward (1999, para. 28)

16-17). "The CI report must clearly present the significance of the collected findings and point out the recommended path based on that intelligence" (Ward, 1999, para. 17).

Both analyst and decisionmaker should be involved in generating the intelligence requirement. When the analyst understands the decisionmaker's goals and the possible

significance of the findings, planning both the research and the report's structure becomes easier and more effective (Ward, 1999, paras. 20-22).

Finally, analysts should rejuvenate their writing skills by reading one of the many guides to rhetorical excellence, such as *Elements of Style*, by William Strunk, Jr., and E. B. White (Ward, 1999, paras. 26-27).

#### Frank Watanabe

"It does not matter how much you know about a subject unless you clearly and effectively communicate the intelligence and your assessment to the consumer in a timely manner", according to Frank Watanabe of the CIA's Directorate of Intelligence (DI) (Watanabe, 1997, para. 7). Concise writing, as well as ego-suspension, is also important for intelligence analysts. "Too many analysts strive to demonstrate their depth of knowledge and sophistication in their products by loading them with facts and details. But the consumer of intelligence does not care how much you know. He wants you to tell him only those things that are really important for him to know and what they mean" (Watanabe, 1997, para. 10).

#### **Susan Wernicke**

In *What is a Crime Bulletin*, Susan Wernicke (n.d.) offers tips to LEI analysts on how to write for their profession.

Wernicke mentions that analysts tailor the format of their reports depending on their decisionmaker: "there are many types of publications that a crime analysis unite [sic] is expected to prepare for a variety of audiences" (Wernicke, n.d., para. 2).

Analysts should decide how often they publish their bulletins based on the amount of time and information they have to produce it, and the amount of information that their audience will be able to absorb (Wernicke, n.d., How does an analyst decide how often to publish? section, para. 2).

Under the heading *In what computer program should the document be prepared?*, Wernicke asserts that it does not matter; "the *content* of the document is what matters" (n.d., para. 1).

LEI analysts should ensure their products "have intelligence value for the targeted audience" before starting to write (Wernicke, n.d., What types of information should be included in the bulletins? section, para. 2). Regardless of relevance, Wernicke cautions against including the following in the document:

cartoons;

- spelling and grammar errors;
- inside jokes;
- rumors;
- insults;
- "unconfirmed/unreliable information"; and
- personal opinion (n.d., What types of information should be included in the bulletins? section, para. 5).

She also offers a wide range of advice for writing various types of reports:

- simplicity and brevity (n.d., Summary of police reports section, para. 1);
- "use complete sentences" (n.d., Summary of police reports section, para. 1);
- highlight identifying information (e.g. name, address, date, vehicle) in bold (n.d., Summary of police reports section, para. 1);
- include all relevant reference numbers (n.d., Summary of police reports section, para. 1)
- maps should be current, relevant, easy to comprehend, and include all appropriate labels (n.d., Maps section, para. 1);
- use charts and graphs sparingly, but make sure their labels are clear and apparent (n.d., Charts/Graphs section, para. 1);
- "OFFICERS LOVE PICTURES!" such as active, arrested and wanted photos (n.d., Pictures section, para. 1);
- use one-line "safety tips" to fill in white space on a bulletin "to make it all look symmetrical" (n.d., Safety Tips section, para. 1);
- distribute products via paper copies, rollcalls, email, bulletin boards, fax, or regular mail (n.d., How can they be distributed section, paras. 1-2);
- get officer feedback and adjust the intelligence products accordingly (n.d., Some final points/hints/suggestions section, para. 2);
- two-page bulletins (one double-sided page) are ideal (n.d., Some final points/hints/suggestions section, para. 5); and,
- take the job seriously, "The idea is not to entertain the reader, but to inform the reader, providing timely, useful, and accurate information!" (n.d., Some final points/hints/suggestions section, para. 14).

Interestingly, to "help increase your readership" (n.d., Summary of police reports section, para. 5), Wernicke writes: "Including the officers' and detectives' names has an added benefit. People like to see their name in print (when in a positive light)" (n.d., Summary of police reports section, para. 5).

#### Kristan J. Wheaton

US Army Foreign Area Officer and former Attaché in the Office of the Legal Counselor, US Embassy, The Hague, Kristan J. Wheaton discusses "what is rapidly becoming the

"At the end of the analytic process, you should be able to state your conclusion succinctly and convincingly, defend it against attacks both serious and half-hearted and be willing to have a decisionmaker stake money, property and lives on the strength of it."

Kristan J. Wheaton (2001, p. 70)

number one problem for decisionmakers at all levels – information overload" in his book *The Warning Solution: Intelligence Analysis in the Age of Information Overload* (2001, Contents and Summaries section, para. 1).

Of an analyst, Wheaton states: "What he does, he does for a decisionmaker" (2001, p. 27). From that, the analyst's product "should be targeted for a specific

decisionmaker" (Wheaton, 2001, p. 8) not only in content, but also in format. "Call me radical but my recommendation is and has been to deliver an assessment to the decisionmaker in the form that he or she, the decisionmaker, finds most useful" (Wheaton, 2001, p. 70). Wheaton also recommends that the decisionmaker's initial requirement be sufficiently detailed and clear (2001, p. 52).

Analysts should go beyond these exact demands, however, in order to do the best possible job. Intelligence requires effort on the analyst's part "to not only find useful answers to the questions that the decision makers ask but also to find useful answers to the questions they should be asking" (Wheaton, 2001, p. 9). Further, a "good intelligence unit should be actively looking for information and formulating analysis that warns of threats and identifies opportunities" (Wheaton, 2001, p. 9).

Wheaton discusses – at different places in the book – four points that are noteworthy for analysts:

- analysts should use all-source information (2001, pp. 52-3);
- analysts should have a good understanding of many or all aspects of their issue in question in order to put current events into context (2001, pp. 54-5);
- "information is useful only if it is timely" (2001, p. 8); and
- in their conclusions, analysts should use consistent words of estimative probability and write clearly and concisely (2001, p. 69).

"Conclusions will come and when they do, it is best to have the vocabulary necessary to characterize these thoughts.... In its finest form, these carefully crafted conclusions accurately and briefly convey the analyst's best guess as to what is going to happen next" (Wheaton, 2001, p. 69).

Lastly, the best intelligence assessments:

- "have the right level of specificity" (Wheaton, 2001, p. 69);
- clearly indicate uncertainties/unknowns or "appropriate avenues for resolution" (Wheaton, 2001, p. 69);

• "are properly qualified", that is, analysts make their level of confidence in the analysis (or level of uncertainty) clear to the decisionmaker, either through consistent words of estimative probability or by using numbers to convey probability (Wheaton, 2001, 69-70).

#### James A. Williams

In the Preface to Lisa Krizan's *Intelligence Essentials For Everyone*, James A. Williams, LTG, US Army (Ret.), former Defense Intelligence Agency (DIA) Director, praises the author's writing for laying out her argument "in clear, concise language" (1999, Preface section, p. 5).

He advocates that for analysts to produce "good intelligence", they must base it on validated requirements, although "it may be derived from a wide variety of sources, not all of which are reliable" (Williams, 1999, Preface section, p. 5). By understanding their decisionmaker's needs and the sources available to them, analysts are then able to "choose the correct methodology to arrive at useful answers" (Williams, 1999, Preface section, p. 5).

#### Paul D. Wolfowitz

Deputy Secretary of Defense Paul D. Wolfowitz's opinions on the analyst's role in helping policymakers manage uncertainty (summarized in Jack Davis' *The Challenge of Managing Uncertainty*, 1996) stress close relationships, clear communication, and provision of all relevant evidence.

In Wolfowitz's view, analysts play a key role for decisionmakers, namely, they help the latter manage uncertainty. "Uncertainty about the meaning of events and especially about prospective threats and opportunities complicates every policy decision. On a good day, you deal with 60-40 odds. Most of the time it is much less clear-cut than that" (Davis, 1996, Intelligence and Policy section, para. 5).

For Wolfowitz, analysts and their products are most useful when they:

- "clarify what is known by laying out the evidence and pointing to cause-and-effect patterns";
- "carefully structure assumptions and argumentation about what is unknown and unknowable"; and,
- "bring expertise to bear for planning and action on important long-shot threats and opportunities" (Davis, 1996, para. 2).

In order for analysts to know exactly their policymaker's agenda and needs and vice versa – for the policymaker to comprehend what the analyst can offer – close personal

"Absent the evidence on which analysts' judgments are based, the policymaker has only a bureaucratic interest in intelligence judgments..."
(Davis, 1996, What Adds Value and What Does Not section, para. 3)

relationships are very important (Davis, 1996, para. 4). In this way, analysts can tailor their analyses to their specific audience. Additionally, as Wolfowitz comments, "Intelligence production should be driven by the policy process" (Davis, 1996, Intelligence and Policy section, para. 12).

He also finds "customized, continuous, and largely informal support" much more useful than "intelligence effort put into formal, arms-length papers" (Davis, 1996,

Intelligence and Policy section, para. 20).

Regarding clear communication, analysts best serve their decisionmakers with products containing full explanations for judgments and the facts that support them, rather than with opinion-based writing (Davis, 1996, para. 3). "The notion that the opinions of analysts should be the main product--when often they are not a useful product at all--is a recipe for having analysis ignored" (Davis, 1996, What Adds Value and What Does Not section, para. 2). To preclude this outcome, analysis must "lay out the facts, the evidence, and the analysis rather than simply stating conclusions or analytical judgments" (Davis, 1996, What Adds Value and What Does Not section, para. 4).

Further, analysis should reflect all uncertainties and dissenting views among analysts, and should not "usurp the decision role of policymakers by prematurely limiting the options on the table" (Davis, 1996, Analysis as "Tools" section, para. 2).

#### **Conclusion: Fourteen Maxims For Intelligence Analysts**

This survey of what forty-one decisionmakers want and need from their intelligence analysts is quite revealing – and in some ways, not surprising. Despite the highly nuanced nature of some summaries, yet consistent with the initial hypothesis, a number of common themes emerge from most, if not all, of them. If the overriding theme is "communication", the micro-level desires break down into three main sub-themes.

Intelligence should be holistic – in that it includes all relevant data, user-friendly – in that it is easy to read and understand, and based on a clear understanding of the decisionmaker's needs and wants – attained through personal relationships between analyst and decisionmaker. These are further broken down below, and explained in more detail in the following pages:

#### Holistic

**Options.** Decisionmakers want the full range of options and opportunities.

**Unbiased.** Decisionmakers want unbiased, honest, and complete intelligence products.

Accuracy. Decisionmakers want accurate intelligence.

Accountability. Decisionmakers want analysts to bear personal responsibility.

#### **User-Friendly**

**Packaging.** Decisionmakers want attractive, user-friendly packaging.

**BLUF.** Decisionmakers want the bottom line up front.

**Clarity.** Decisionmakers want clear and straightforward words.

**Concision.** Decisionmakers want writing to be concise.

**Consistency.** Decisionmakers want some form of standardized terminology.

**Timeliness.** Decisionmakers want timely intelligence.

#### Based on the decisionmaker's needs and wants

**Decisionmaker-focused.** Decisionmakers want products to be tailored to their needs.

**Close Relationships.** Decisionmakers want close relationships with their analysts.

**Novelty.** Decisionmakers are well informed on intelligence matters.

**Informality.** Decisionmakers want a shift toward informal, real-time analytic insights.

#### Holistic

When put together – or *analyzed* – most decisionmakers wanted intelligence products that were all-inclusive. That is, they want products that: combine all relevant information, all dissenting views, and all possible options, opportunities or threats available to them; and whose information was accurately written by analysts who took personal responsibility for their work.

#### Maxim #1:

# 15 Decisionmakers For Lots Of Options

As it is typically not the analyst's job to make policy recommendations, it is unlikely that by "options", the decisionmakers mean "policy recommendations". To clarify this proposition, then, it is better that analysts interpret 'lots of options' to mean that decisionmakers want to know the full range of hypotheses tested, as well as the analyst's estimate as to which is most likely. Wheaton and Wolfowitz articulate this well when they suggest that analysts should clearly indicate uncertainties/unknowns or "appropriate avenues for resolution" (Wheaton, 2001, p. 69), but not "usurp the decision role of policymakers by prematurely limiting the options on the table" (Davis, 1996, Analysis as "Tools" section, para. 2).

Fifteen decisionmakers expressly stated their desire for a range of options and opportunities. Their statements ranged from simply wanting all options and information (Blackwill, Clarke & Eck, Counterdrug, Hohhof, Laquer, Lawrence & Lowenthal), to adding insight as to how the options affected either various outcomes or the US (Armstrong & Krizan), to a warning of potentially dangerous discontinuities (Medina). Breckenridge and Petersen desire that analysis also reflect uncertainties and differing viewpoints, which, for Wolfowitz, are common among analysts to preclude "usurping" the policymaker's decisionmaking role by limiting the latter's options prematurely (Davis, 1996, Analysis as "Tools" section, para. 2). Wheaton recommends that analysts transcend what the decisionmaker has asked of them to provide answers to the questions they *should have* asked. And, when hard evidence is scarce, Petersen advocates making all assumptions and knowledge clear to the decisionmaker.

#### Maxim #2:

# 15 Decisionmakers For Honest Intelligence

Nine decisionmakers desired intelligence that was a mix of being honest (Blackwill), unbiased (Armstrong & Johnson), objective (Breckenridge, Kirkpatrick, Krizan, Lawrence, Lowenthal, Marilyn B. Petersen, & Petersen), and free from the analyst's personal opinion (Wolfowitz).

Ward declares analysts as the "Chief Truth Tellers" and requires their reporting to be fair, impartial and truthful. McDowell encourages analysts to have the courage to tell it

like it is, and Hohhof urges analysts to declare overtly any conflicts in facts, biases or preconceptions they might have.

#### Maxim #3:

## 13 Decisionmakers For Accuracy

Two different elements are wrapped into the concept of accuracy: process and product. An accurate process reflects more the analyst's approach to the analysis. The decisionmakers' talk about having close relationships with their analysts seems to reflect its importance, where this relationship spawns a decisionmaker's confidence in the analyst – and by extension, the process. An analyst who approaches their decisionmaker for clarity on an intelligence requirement suggests an accurate process, for example, as does the analyst that takes the time to explain their capabilities to their decisionmaker and learn of the latter's needs and wants.

On the other hand, under "accurate product" fall such things as reliable sources and accurate analysis.

In a general sense, thirteen decisionmakers mentioned accuracy as a goal for intelligence analysts. Knapp considers accuracy among "the cardinal qualities of intelligence writing" (1964, p. A4), and Best writes that it is intelligence's ultimate goal (2005, p. 10). McDowell hopes analysts have the conviction that they thoroughly carried out their research and that the conclusions reached are appropriate, and Johnson considers accurate intelligence to be the best shield against US intelligence failures (1989, p. 60).

Laquer suggests that analysts must make decisionmakers believe in a product's accuracy, and Breckenridge, Hohhof and Wheaton feel that accurate analysis depends on the analyst's ability to put current events into historical context, based on a vast, deep knowledge of the subject. In a more general sense, Simon believes analysts should fully know and comprehend their topic. Krizan also stresses accuracy in analysis and feels it should be a criterion for decisionmaker feedback.

Piecing his argument together, Petersen recommends ensuring that the process is accurate through a three-level review process that would make certain the analyst asks the right questions, considers all information, clearly supports the argument with

evidence that itself is accurately represented, documents all facts and sources, and explains, when needed, why an analysis differs from previous analyses.

A number of decisionmakers, however, mention the importance of clear, reliable sourcing in intelligence documents.

Lowenthal mentions that one way for analysts to make their products stand out against the "daily flood of information" that decisionmakers receive is to highlight the "unique nature of the intelligence sources" (2003, p. 87). Lawrence, Wheaton and Williams state that analysts should utilize all-source information for their analyses, and Williams points out that not all sources are necessarily reliable. He also suggests that analysts are able to choose the best methodology to arrive at their answer when they understand both the sources they will use and the decisionmaker's needs. To test source reliability, Lawrence suggests analysts check each source against at least two others; citing sources, he says, adds credibility and credits the originator.

Both Marilyn B. Petersen and Martin Petersen claim that analysts should ensure they document well and correctly and accurately represent their sources.

Krizan notes that analysts must evaluate their sources based on three criteria – reliability, proximity and appropriateness – in order to assess the information's relevance and value to their requirement. Reliability depends on the source's past performance; and for a new source, analysts must evaluate its reliability based on its own merits. Analysts categorize proximity according to the source's closeness to or distance from the raw information, dividing sources into, for example, primary, secondary and tertiary information. "Appropriateness of the source rests upon whether the source speaks from a position of authority on the specific issue in question" (Krizan, 1999, Evaluating and Selecting Evidence section, p. 28).

Krizan also highlights three features of the information that bears on its applicability:

- plausibility is the information true "under any circumstances or only under certain conditions, either known or possible" (Krizan, 1999, Evaluating and Selecting Evidence section, p. 28);
- expectability the analyst assesses expectability based on their existing knowledge of the subject (Krizan, 1999, Evaluating and Selecting Evidence section, p. 28); and
- support another piece of evidence corroborates the information, or different evidence "points to the same conclusion" (Krizan, 1999, Evaluating and Selecting Evidence section, p. 28).

In his Washington Post article, *What Percent is 'Slam Dunk'*?, Michael Schrage argues for better, more clear intelligence estimating with the Intelligence Community's

implementation of two numbers attached to each intelligence product. One number, here, on a 0-1 scale, indicates the analyst's analytic confidence (Schrage, 2005, para. 10). A score of 0.0 is the lowest possible confidence, whereas 1.0 is the highest. The second number, on the same scale, conveys their confidence in the quality of the evidence that went into the report's generation (Schrage, 2005, para. 10).

"These two little numbers would provoke intelligence analysts and intelligence consumers alike to think extra hard about analytical quality, creativity and accountability. Policymakers could swiftly determine where their analysts had both the greatest -- and the least -- confidence in their data and conclusions. Decision-makers could quickly assess where "high confidence" interpretations were based on 'low-confidence'.... More significantly, these two numbers would build a record -- an ongoing audit trail of probabilities and odds -- to revisit and review" (Schrage, 2005, paras. 12-3).

Recommendation 10 of *The Commission on the Intelligence Capabilities of the United States Regarding Weapons of Mass Destruction: Report to the President of the United States* (Commission) argues strongly in favor of "forcing" analysts to clearly indicate, include, and vet all of the sources used in their reports. "Finished intelligence should include careful sourcing for all analytic assessments and conclusions, and these materials should—whenever possible in light of legitimate security concerns—be made easily available to intelligence customers" (Silberman, Robb, Levin, McCain, Rowen, Slocombe, Studeman, Wald, Vest, & Cutler, 2005, p. 412).

#### The Commission recommends:

- "forcing analysts to make their assumptions and reasoning more transparent by requiring that analysis be well sourced" (Silberman et al., 2005, p. 412);
- "that all finished intelligence products, either in paper or in digital format, provide citations to enable user verification of particular statements. This requirement is no more rigorous than that which is required in law, science, and the social sciences, and we see little reason why such standards should not be demanded of the Intelligence Community's analysts" (Silberman et al., 2005, p. 412); and
- "that customers have access to the raw intelligence reporting that supports analytic pieces whenever possible, subject to legitimate security considerations" (Silberman et al., 2005, p. 412).

#### As the Commission explains,

"For many intelligence customers, especially senior policymakers and operators, a general description, such as State Department 'diplomatic reporting' simply does not provide the confidence needed to take quick and

decisive action. Where a user accesses finished intelligence electronically, he should be able to link directly to at least some portion of the raw intelligence—or to underlying finished intelligence—to which a judgment is sourced.... [T]he availability of such materials will simply enable users to distinguish quickly between those statements that are paraphrased summaries of intelligence reporting, and those that are analytic judgments that draw inferences from this reporting.

"Intelligence customers should be able to question judgments, and analysts should be able to defend their reasoning. In the end, such a reform should bolster the stature of good analysts, as policymakers and operators come to see their analytic judgments as increasingly accurate and actionable" (Silberman et al., 2005, p. 413).

Further, the Commission strongly advocates open source information: "We are convinced that analysts who use open source information can be more effective than those who don't" (Silberman et al., 2005, pp. 22-3).

The Commission also faults the Intelligence Community for using too few sources (Silberman et al., 2005, p. 14), for using and relying on sources the Community already discredited (Silberman et al., 2005, p. 49), at times because they supported analysts' pre-existing conclusions (Silberman et al., 2005, p. 48), and for not vetting their sources (Silberman et al., 2005, p. 47).

In the final analysis, "The Intelligence Community placed too much weight on one source to whom the Community lacked direct access—and did so without making clear to policymakers the extent of the judgment's reliance on this single, unvetted source" (Silberman et al., 2005, pp. 110-11).

#### Maxim #4:



### Decisionmakers For Accountability

Eight decisionmakers address the issue of requiring analysts to bear personal responsibility for their work – which, if inefficient, has exceptionally costly consequences, as Krizan notes (1999, Assessing and Exchanging Best Practices section, p. 4). A few directly call on the Intelligence Community to hold analysts accountable.

The Final Report of the Congressional Joint Inquiry Into 9/11 strongly urged that the Intelligence Community put into place measures to ensure accountability: "Assured

standards of accountability are critical to developing the personal responsibility, urgency, and diligence which our counterterrorism responsibility requires" (U.S. Senate Select Committee on Intelligence & U.S. House Permanent Select Committee on Intelligence, 2002, Recommendation 16 section, para. 1).

To emphasize the need for accountability:

- "The Director of Central Intelligence should report to the House and Senate Intelligence Committees...as to the steps taken to implement a system of accountability throughout the Intelligence Community, to include processes for identifying poor performance and affixing responsibility for it, and for recognizing and rewarding excellence in performance" (U.S. Senate Select Committee on Intelligence & U.S. House Permanent Select Committee on Intelligence, 2002, Recommendation 16 section, para. 2);
- "the Inspectors General at [various IC institutions] should...conduct investigations and reviews...to determine whether and to what extent personnel at all levels should be held accountable for any omission, commission, or failure to meet professional standards in regard to the identification, prevention, or disruption of terrorist attacks.... These reviews should also address those individuals who performed in a stellar or exceptional manner.... Based on those investigations and reviews, agency heads should take appropriate disciplinary and other action..." (U.S. Senate Select Committee on Intelligence & U.S. House Permanent Select Committee on Intelligence, 2002, Recommendation 16 section, para. 4).

Wheaton argues, "Analysts and decision makers are both responsible for their actions. Where there is responsibility, there is accountability. Make no mistake about it – this thought scares analysts as much as it does decisionmakers" (2001, p. 7).

People tend to talk more freely when there is no penalty for doing so; holding someone personally responsible or accountable for their actions or opinions, then, changes what they say, as Wheaton notes:

"The...difference between opinions and analysis is that the analyst puts his professional reputation on the line when he makes an analysis. For whatever reason, stating something, anything, 'for the record' makes a world of difference in what an individual is or is not willing to say. Perhaps the commonest expression in any boardroom or meeting place is, 'In my opinion...' followed closely by 'Personally...' Ask these same people to put that opinion in writing or to raise that same point with the boss and they will usually retreat rather quickly to their cubicles" (2001, p. 65).

Laquer feels that decisionmakers will put more trust in intelligence products if they know and have close contact with the analyst that wrote it: "There is frequent resistance against anonymous writings even if they are well reasoned and adequately supported data" (1985, p. 107).

David Brooks, a New York Times contributor, picks up this notion of anonymity in his article *The Art of Intelligence*, in which he criticizes the Intelligence Community for preparing "bloodless compilations of data by anonymous technicians" (that is, CIA analysts) (Brooks, 2005, para. 5). Brooks makes clear his lack of faith in current efforts to reform the Intelligence Community and suggests a more appropriate and effective path to better intelligence products. "I'll believe the system has been reformed when policy makers are presented with competing reports, signed by individual thinkers, and are no longer presented with anonymous, bureaucratically homogenized, bulleted points that pretend to be the product of scientific consensus" (2005, para. 15).

"Better accountability promotes better analysis", says Michael Schrage, senior adviser to MIT's Security Studies program, in *What Percent is 'Slam Dunk'*? (2005, para. 15). He argues that the Intelligence Community can create "a less ambiguous standard of accountability" if analysts numerically express their confidence in both their sources and analysis (2005, para. 14), as better analysis "comes from the explicit explanations and conversations around probability and risk" (2005, para. 15).

The FBI considers past experience with being personally responsible to be a sufficient quality in potential applicants who, perhaps, lack actual field experience. Under a job posting for an Intelligence Analyst position, the Bureau notes that it will accept candidates who have "Two years of experience gained in a position that involves the exercise of analytical ability, judgment, discretion and personal responsibility for an organized body of knowledge" (FBI, 2005, Other Acceptable Experience section, para. 1).

Two high-ranking decisionmakers address the idea of, and value in, personal responsibility and accountability: President George W. Bush and Former Deputy Director of Central Intelligence Richard J. Kerr.

Bush advocates that all Americans demonstrate these traits: "I oftentimes say, it's important for us to have a culture of personal responsibility" (Bush, 2004, para. 110).

Kerr owned up to his share of personal responsibility in his November 1995 statement to the House Permanent Select Committee on Intelligence regarding Intelligence Community Management:

"This is a difficult period for CIA and a tough time for someone to argue its merits. But I am proud to have worked at CIA for thirty plus years. The Agency

did some extraordinary things for this country. I was part of those successes. I do regret some of the things I did not do, some of the questions I did not ask, some of the actions I did not take. As to personal responsibility, I am a product of CIA's culture and I influenced that culture. I share its credit for what it did well and share the blame for its shortcomings" (para. 2).

#### **User-Friendly**

Perhaps the most widely discussed area of concern for decisionmakers was the case for a user-friendly intelligence product. Off the bat, analysts can make intelligence user-friendly with good packaging – a feat that also leads to accessibility, and by putting the bottom line up front (BLUF). As the decisionmaker reads the document, a blend of clarity, brevity and consistent terminology further accommodates their busy schedule and eases comprehension. Even with all of these traits, intelligence is useless if not delivered in a timely fashion.

#### Maxim #5:

# 13 Decisionmakers For Good Packaging

MacEachin likely said it best when he commented: "You must focus the policymaker's attention. They are busy. They like pictures and graphs" (Johnson, 1989, p. 97). Focusing the audience's attention is essential to getting almost any document read, and Knapp notes that format and style may be more important in intelligence than anywhere else (1964, p. A1), while Lowenthal considers it one of the four points of good intelligence. Both Kent and Hanrahan assert that analysts must tailor their packaging to suit the specific diversities and requirements of their decisionmakers, Kirkpatrick second's this notion with his recollection of analysts using maps and colors in their daily reports, and Martin offers some tips to meet their consumer's "desires for speed and convenience" (1970, p. 113). Sawka notes that packaging must be appealing to the eye, error-free and professional looking.

Martin is perhaps the biggest advocate of packaging here, calling for systematic organization of intelligence documents. Following from Martin's lead, good packaging is vital for reasons inherent in the definition. Carefully organized intelligence layouts facilitate accessibility – which Counterdrug, Krizan and Marilyn B. Petersen support – where decisionmakers can quickly find key points and estimates in an intelligence product, usually due to the analyst's use of headings, subheadings, graphics, and

differentiated font styles (e.g. bold or italics). Hohhof and Lawrence further mention that analysts should brand their product in a unique – but consistent – way, to make it stand out.

#### Maxim #6:

### Decisionmakers For A Bottom Line Up Front

Eight decisionmakers – six from the above summaries and two from alternative sources – mention the importance of putting the bottom line up front. Hanrahan promotes this writing style, most notably in the form of a "summary up front" (1967, p. 4) and Krizan simply asserts that analysts must put their bottom line up front (BLUF). Furthermore, Australian Chief of Army, Lieutenant General P.F. Leahy, AO announced in a speech at a Defence [sic] Watch Seminar: "My training has given me a preference for giving my bottom line up front" (2002, para. 2). And the CIA's own brochure for the Sherman Kent School for Intelligence Analysis reads: "DI writing style emphasizes the bottom line up front, precise and concise language, and a clear articulation of our judgments and our confidence in them" (Roberts, Rockefeller, Hatch, Dewine, Bond, Lott, Snowe, Hagel, Chambliss, Warner, Levin, Feinstein, Wyden, Durbin, Bayh, Edwards, Mikulski, Frist, & Daschle, 2004, p. 4).

Two decisionmakers (Counterdrug & Lawrence) encourage analysts to use topic sentences and headlines to put the most important and interesting information up front, and Fiora and Hohhof highlight the necessity of this habit in order to keep the reader's interest.

#### Maxim #7:

# **21** Decisionmakers For Clear Wording

The second most common issue (tailored intelligence products is first) brought up in the decisionmaker summaries is their desire for clear, straightforward, basic wording in intelligence documents. Some mentioned this subject in the context of making the decisionmaker's job easier (Blackwill, Knapp, Martin, & Wolfowitz), where Knapp explains best that clearly written documents implicitly recognize that busy decisionmakers have only minimal time to read and comprehend them (1964, p. A1).

It was clear (no pun intended) that intelligence decisionmakers beseech analysts to avoid complexities (Blackwill & Counterdrug) and jargon (Hohhof, Martin & Sawka),

strive for clear and effective communication (Clarke & Eck, McDowell, & Ward) regardless of how vast their knowledge may be (Watanabe), and make clear what lay behind the judgment that the audience cannot know (Petersen). Krizan argues that clarity enables decisionmakers easily to comprehend the document, and Williams, in the preface to her book, praised *Krizan* for its clarity.

Five decisionmakers want analysts to clearly convey the difference between what is fact (known) and what is judgment (unknown), as well as their uncertainties and any lack of information (Breckenridge, Laquer, Lowenthal, Marilyn B. Petersen, & Wheaton). Breckenridge notes that most controversy lies where analysts make judgments that transcend the facts

Fiora admitted that good writing takes time – but the effort gets good results.

#### Maxim #8:

# 13 Decisionmakers For Concise Writing

As most decisionmakers mentioned the frenzied schedules innate to a high-level lifestyle, it is apparent that amidst this busy-ness, brevity is valued. On this track, thirteen decisionmakers above overtly mentioned brevity. From their accounts, it is apparent that they disapprove – and may even be frustrated – when analysts stuff reports full of extraneous information (Clarke & Eck, Fiora, & Hohhof), perhaps to flaunt their vast knowledge (Knapp & Martin). Other accounts highlight concision as assistance to a decisionmaker's busy life, as mentioned above (Breckenridge, Hanrahan & Knapp). Further, Lowenthal states that short papers are good papers, Wheaton argues for brevity especially in conclusions, and Williams appreciated the concision that Krizan displayed in her book.

Sawka simply mentions the need for brevity, and Lawrence notes analysts may consider abbreviating reports in special cases and providing the decisionmaker with the means to access the full and detailed version.

#### Maxim #9:

B Decisionmakers For Consistent Terminology

Most famous for an argument for a standardized set of intelligence terminology is Sherman Kent and his 1964 Studies in Intelligence article *Words of Estimative Probability*. Kent studied then-commonly used words and expressions when he realized that his Board of National Estimates colleagues interpreted the meaning of "serious possibility", which was part of their NIE "Probability of an Invasion of Yugoslavia in 1951", in vastly different ways. While Kent felt the odds relating to "serious possibility" meant 65 to 35 (in favor of an attack), "each Board member had had somewhat different odds in mind and the low man was thinking of about 20 to 80, the high of 80 to 20. The rest ranged in between" (Kent, 1964, p. 52). To tackle this disparity, Kent formulated a table of common probability words and their corresponding likelihoods, expressed as a percentage (See Annexes 2 and 3). He has pushed consistently for standardizing the intelligence language.

In spring of the same year, Frank A. Knapp, Jr., in his article *Style and Stereotypes in Intelligence Studies*, mentions the issue of intelligence terminology that seems to be common among analysts: "The words possibly, probably, likely, unlikely, may be, seem, almost certainly, according to, presumably, allegedly, ostensibly, believed to be, and a few others are bound to recur in intelligence writing. They are accepted as indispensable guides and warnings" (Knapp, 1964, p. A3).

That fall, David L. Wark's *The Definition of Some Estimative Expressions* supports Kent by arguing that it is possible to define words of estimative probability quantitatively "without making them artificially precise" (Wark, 1964, p. 67).

George Berkeley's 1965 article *For a Board of Definitions* attempts to hold analysts (that is, writers of intelligence) accountable for using vague terminology. As an example, he dissects the word "nationalism", identifying no less than five meanings for it. Nationalism is:

- "loyalty and devotion to a nation (*Webster's Seventh New Collegiate Dictionary*)" (Berkeley, 1965, p. 14);
- "the preference for the competitive interest of a nation and its members over those of all outsiders in a world of social mobility and economic competition... (Karl W. Deutsch in *Nationalism and Social Communication*)" (Berkeley, 1965, p. 14);
- "a state of mind in which we give our paramount political loyalty to one fraction of the human race to the particular tribe of which we happen to be tribesmen (Arnold J. Toynbee in *New York Times Sunday Magazine*)" (Berkeley, 1965, p. 14);
- "a product of political, economic, social, and intellectual factors at a certain stage in history... (Louis L. Snyder in *The Meaning of Nationalism*)" (Berkeley, 1965, p. 14); and

• "the measles of mankind (Albert Einstein, quoted in a letter to *Time*, issue of 12 March 1965)" (Berkeley, 1965, p. 14).

This particular example arose from actual experience, where "[o]n one day in early 1964, I read two accounts of a crisis in Brazil's state petroleum agency, Petrobras" (Berkeley, 1965, p. 13). The first, a newspaper editorial, called the Petrobras president a "nationalist", saying that the nationalists and Communists denounce each other (Berkeley, 1965, p. 13). The second, an intelligence report, quoted a Communist leader, and made clear that he and the "nationalists" were allied against the Petrobras president (who obviously in this case was not a "nationalist") (Berkeley, 1965, p. 13).

After further defining "nationalism", Berkeley admits, "The label is thus subject to more interpretations than the elephant was to the seven blind men" (Berkeley, 1965, p. 15), and states, "Now is the time...to set up a board to define abstract concepts relevant to the intelligence business" (Berkeley, 1965, p. 15). He proposes a review board to assimilate all known definitions of "abstract" words in use, send the definitions to official and unofficial participating entities, and result in one agreed-upon definition (Berkeley, 1965, p. 16).

In their March 31, 2005 report to President George W. Bush, the WMD Commission also argues – again – for a standardized intelligence language:

"[A]nalysts must also find ways to explain to policymakers degrees of certainty in their work. Some publications we have reviewed use numerical estimates of certainty, while others rely on phrases such as "probably" or "almost certainly." We strongly urge that such assessments of certainty be used routinely and consistently throughout the Community. Whatever device is used to signal the degree of certainty—mathematical percentages, graphic representations, or key phrases—all analysts in the Community should have a common understanding of what the indicators mean and how to use them" (Silberman et al., 2005, p. 419).

Adding to the pool of people interested in clear estimative language is Washington Post writer and senior adviser to Massachusetts Institute of Technology's [MIT] Security Studies program Michael Schrage. In his February 2005 article *What Percent Is 'Slam Dunk''?: Give Us Odds on Those Estimates*, Schrage argues that analysts should assign odds – or numerical values – to estimates (Schrage, 2005, para. 9). "Policymakers can't weigh the risks associated with their decisions if they can't see how confident analysts are in the evidence and conclusions used to justify those decisions" (Schrage, 2005, para. 2). To remedy this, analysts would assign two numbers to their estimates: one assesses the quality of their evidence; the other identifies their analytic confidence (Schrage, 2005, paras. 9-11).

As Schrage correctly points out, "World-class investment banks, insurance companies and public health practitioners are increasingly bringing greater quantitative sophistication to their risk analyses", and yet the intelligence analysts in charge of monitoring and advising US national security are not (Schrage, 2005, para. 3).

Lastly, both Wheaton and Lowenthal argue for strong language. Wheaton advises analysts to use words of estimative probability in their conclusions, and Lowenthal further cautions them to avoid "weasel words" when conveying their uncertainties to the decisionmaker.

#### Maxim #10:

### 13 Decisionmakers For Timely Intelligence

Thirteen decisionmakers mentioned timeliness of intelligence in their summaries. One considers timeliness as part of the basis for credibility (Petersen); another claims that it is key to the analyst-decisionmaker relationship (MacEachin). Four decisionmakers mention timeliness in the context of prevention or defense. Johnson notes that timely intelligence forms part of the shield against intelligence failures, both Watanabe and Wheaton state that intelligence is only useful if it is timely, and Jacoby bluntly mentions that the timeliness of intelligence can mean the difference between victory and defeat, life and death. Lowenthal argues that analysts can add value to their intelligence by delivering it in a timely manner, and Sawka and Ward believe intelligence should be actionable, while Krizan concurs and suggests that a timeliness score should be part of the decisionmaker's feedback.

Three decisionmakers simply promote timeliness as a good quality for intelligence products (Hohhof, Lawrence & McDowell).

#### **Based On The Decisionmaker's Needs And Wants**

The one thread that permeated each decisionmaker summary was this: intelligence decisionmakers are smart, self-serving beasts, and analysts should take note. It seems simple for analysts to put themselves in their decisionmaker's favor – they need to develop a close relationship with the decisionmaker that enables them to provide

intelligence products that are highly relevant to their specific audience. The analyst's services rendered include tailored intelligence products, an intimate relationship with the decisionmaker, unique insights into relevant issues, and, possibly increasingly, disseminating less-formal intelligence products.

#### Maxim #11:

### 27 Decisionmakers For Customized Intelligence Products

The number one desire that decisionmakers have is that for meaningful intelligence. While only twenty-seven (of forty-one) decisionmakers specifically discussed – at length – the importance of intelligence that analysts customize to their unique demands, the idea threaded throughout almost all of the summaries.

Some decisionmakers described their personal needs as "self-serving" (Blackwill, Hanrahan, & Martin), while others indicate that tailoring reflects product quality and analyst credibility (Kent & Petersen). Wolfowitz notes that custom intelligence better assists decisionmakers to manage uncertainty. Medina, on a similar path, suggests that

"Scientific minds do not so much provide the right answers as asking the right questions." Claude Levi-Strauss, French anthropologist tailored intelligence is one of an analyst's main purposes, and they should incorporate decisionmaker feedback into product planning. Lawrence also suggests using feedback as a method to tailor future products.

Seven decisionmakers discussed the idea of requirements that Medina mentions. Both Lowenthal and Wheaton feel requirements should be clear and detailed. Lowenthal takes this further to state that decisionmakers should know exactly their needs and convey these to analysts. Barndt, Dearth and Ward feel that close involvement between the decisionmaker and analyst when making the requirement produces one that is sufficiently detailed, and Williams notes that good intelligence is based on validated requirements and analysts need to understand what their decisionmakers want. On a different path, Simon asserts that analysts with good cognitive abilities can better comprehend and discern what decisionmakers want, and guide them to producing sufficiently specific and detailed requirements.

Krizan is forthcoming when she remarks that analysis that is not tailored to the decisionmaker is irrelevant, and Laquer is equally so when he considers non-tailored intelligence a "communication failure".

Seven decisionmakers support intelligence that analysts customize in both form and content (Clarke & Eck, Counterdrug, Hohhof, Krizan, Lowenthal, Sawka, & Wheaton).

More generally, three decisionmakers are simple advocates of intelligence that is purposefully relevant to the decisionmaker to address their needs (McDowell, Petersen & Simon), and two note that analysts should also tailor their writing style to the level of the audience (Fiora & Marilyn B. Petersen).

#### Maxim #12:

### 13 Decisionmakers For Close Personal Relationships

The foundation for highly customized intelligence is a personal relationship between analyst and decisionmaker, and it seems that at least fourteen decisionmakers do not mind at all if this relationship is close.

Blackwill maintains that a close relationship is the key to analysts getting their reports read, while Kent advocates the analyst using their deep knowledge of the decisionmaker to anticipate the latter's demand for new products. Others comment that only with a close personal relationship will the decisionmaker know exactly what the analyst can provide – and conversely, the analyst will determine what the decisionmaker wants (Blackwill, Laquer, Medina & Wolfowitz). Lowenthal believes in this relationship but states that analysts need to make the effort, because decisionmakers will not.

Barndt, Dearth, Hohhof, Ward and Williams' comments regarding the necessity of a close decisionmaker-analyst relationship either when forming requirements or seeking follow-up promote the idea of a personal relationship at all times, and Krizan advocates this relationship at all times throughout the intelligence cycle.

Simon states that analysts can preclude "the blame game" for producing ineffective or poor intelligence by communicating and working with their decisionmakers to clarify and agree on expectations of each person and the goals towards which they will work. Further, analysts can generate a more successful and fulfilling relationship when they have strong cognitive abilities that help them to understand clearly their decisionmaker.

### Maxim #13:

# Decisionmakers For Information They Don't Actually Know

Seven decisionmakers highlighted the fact that they are more knowledgeable on events and issues than analysts think. Kent, in his blunt style, advises analysts to "Realize that the policymaker is no dope" (Davis, 2003, Warning Analysis: The Danger of Too Distant a Relationship section, para. 30), and Medina – writing almost 50 years later – notes analysts need to adjust to this fact. Blackwill, from another perspective, details the amount of "reading up" that decisionmakers do.

Due to their self-taught smarts, decisionmakers want analysts to provide them with new, insightful intelligence and possibilities. Simply reporting details and slapping a shallow analysis on the information is useless to the decisionmaker – they likely already know the data and possibly even have better sources.

Additionally, as if mind reading, Wheaton advises analysts to go beyond what the decisionmakers have asked of them to provide information that would be useful but that the decisionmakers may not know to ask about. One way for analysts to do this is by being 'good thinkers'. Both McDowell and Simon believe analysts must be creative thinkers, which allows them to reveal new connections between concepts, and Marilyn B. Petersen promotes good cognition and analytical skills.

#### **Maxim #14:**

# 3 Decisionmakers For Informal Intelligence

Perhaps a newly emerging theme among decisionmakers is their preference for and reliance on less-formalized intelligence forms. Both Wolfowitz and Medina explicitly recognized the value in real-time, as-needed, "raw" intelligence reports from analysts in the form of, for example, emails, telephone calls, or face-to-face run-ins in the hallways. Wolfowitz finds this type of "customized, continuous, and largely informal support" more useful than the typical formal documents that the Intelligence Community is used to producing (Davis, 1996, Intelligence and Policy section, para. 20). Medina claims that 21st century analysts must embrace this type of information sharing and think past formal reports. Further, Krizan notes the shift in delivery methods based on technology's evolution, and asserts that such methods will likely continue to change as time goes on.

# Conclusion

Decisionmakers have been very specific in what they want from intelligence analysis and intelligence *analysts*.

The comments of the 41 decisionmakers surveyed here share many commonalities, and as such, all funnel into a set of 14 maxims. These fit into one of three larger, umbrella categories. The latter are essentially the three criteria that every analyst should strive to meet. That is, they should ensure their intelligence products include all necessary data (holistic), are easy to use (user-friendly) and are relevant to the decisionmaker.

How, though, can analysts go about fulfilling these needs? For example, what are the specific characteristics of a document that makes it "user-friendly"? Do intelligence analysts currently have tools available to them that answer these questions and provide guidance in meeting the 14 criteria listed above?

Section Three will answer these questions, and will generate a set of rules that analysts may employ to help fulfill the maxims.

# Section Two: Effective Communication According To Academia, Science And Other Experts

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# Introduction

"There is nothing so fatal to character as halffinished [sic] tasks", according to David Lloyd George, former Prime Minister of the United Kingdom (Waechter & McAleer, p. 30). This principle extends to intelligence writing – or writing of any kind, for that matter.

Having examined the definition of "good communication" from decisionmakers' perspectives, it is important to examine next the minutiae inherently important in any form of effective communication.

Details are important in effective communication. For example, discussing ways to ensure military justice, Colonel Calvin L. Lewis, U.S. Army, stresses to commanders that they pay "the fullest attention to detail" and resist the "temptation to take short cuts to get things done" (2002, Know The Mission section, para. 3). Further, things such as poor grammar and spelling can convey a lack of attention to detail, notes Dave Riches of Riches Communications, who offer writing and web site design services for product promotions (n.d., Do spelling and grammar matter in email? section, para. 1). The Writing Company, a communications consulting company, also notes, "Good, clear, understandable writing does not happen easily. It takes thought, planning, work, and attention to detail" (n.d., About Our Training section, para. 2).

In order to define clearly these necessary details, this section dissects seven style manuals and writing guides from all sectors – academic, government and private – to determine exactly the kind of detail that is important for analysts to consider when creating intelligence products. Because style manuals do not often explain "why" a certain practice is best, however, it is also necessary to find and include academic, scientific and expert literature that does. Where possible, scientific evidence and expert testimony will follow the style manual tips, explaining the reasoning behind each principle, and either dispelling or supporting the guidelines advocated in the manuals.

The content of style manuals breaks down into two broad categories, and so the discussion in this section examines the macro subjects of Form and Content, and all of their nuances.

What, however, do the concepts of 'Form' and 'Content' mean? In today's world, these two ideas are different from what they have meant since the Intelligence Community founded over five decades ago.

Regarding one aspect of Form, in the 1950s, when intelligence estimates were a decisionmaker's only real source for information, they considered a 20-page report to be 'brief'. For example, the CIA wrote:

- 42 pages for NIE 13-8-74 China's Strategic Attack Programs on 13 June 1974
- (NIC, 2004, pp. 633-74);
- 36 pages (the main text was 24 pages long as the appendix consumed 12) for NIE 13-60 Communist China on 6 December 1960 (NIC, 2004, pp. 251-86);
- 21 pages for SNIE 100-4-59 Chinese Communist Intentions and Probable Courses of Action in the Taiwan Strait Area on 13 March 1959 (NIC, 2004, pp. 193-213); and
- 18 pages for NIE 13-54 Communist China's Power Potential Through 1957 on 3 June 1954 (NIC, 2004, pp. 101-18).

Currently, as the previous section saw, every day decisionmakers are flooded with information from multiple sources and have little time to devote to a single report. Decisionmakers now stress brevity so they can quickly scan through the documents analysts give them.

Additionally, with the advent of the personal computer (PC) and in 1991, the Internet, decisionmakers are more often reading from the screen. Analysts then have to adjust their delivery mechanism to fit with the principles of digital media.

Further, concerning Content, at the IC's inception analysts wrote for an audience of men who were worldly and highly educated, most of them having graduated from prestigious, Ivy League schools. When Colonel (later Major General) William J. Donovan hired his first members of the Office of Strategic Services (OSS) in 1941, he recruited "some of the best and the brightest the country had to offer...[including] people of world knowledge who had studied abroad" (Krametbauer, n.d., para. 6).

Later, in 1948, when newly appointed director of the Office of Policy Coordination Frank Wisner needed to staff his Office, he "was looking for the very best men" (Thomas, 1995, Chapter One section, para. 2), ones he "couldn't find among the paper pushers and timeservers working in the federal buildings" (Thomas, 1995, Chapter One section, para. 3).

"He wanted men who would show initiative, who would be innovative, a little quirky if necessary, but bold. They needed to be fluent in foreign languages, and they needed grace and confidence under pressure. The place to find these men, he believed, was on Wall Street, among the bankers and lawyers who had joined the OSS...; and from among the graduating classes at their old schools, which generally meant Harvard, Yale, and Princeton" (Thomas, 1995, Chapter One section, para. 4).

In the twenty-first century, many things have changed. The analyst now writes for a much broader audience: not just the president, not just the very best men. Not just *men*, either, as women increasingly fill the ranks of decisionmakers. In the mid-twentieth

century, the decisionmakers were Ivy Leaguers; now, anyone from a Private First Class (Pfc) to the president has access to the intelligence. Along this spectrum are now included individuals from all types of education and learning ability.

Today, 'Form' and 'Content' therefore mean different things from 50, even 10 years ago. Analysts must be able to write for a broad audience and in different mediums. To do this, they must take into account universal design principles, so that 100 percent of the population can read and comprehend their work. Beyond research on proper writing guidelines for *printed* material, then, are at least two other subjects to consider when writing a document: writing for the on-screen user, and writing for individuals with learning differences.

As the Internet is fast becoming the primary vehicle for information, decisionmakers increasingly read from a screen and not paper. It is important then for analysts to know how properly to write and present *on a screen*, taking into account some basic facts on how users read from a screen, and what layouts, formats, and writing styles they prefer.

Fortunately, this is not a major endeavor as the modern principles of web design share many similarities with those for effective writing. The average person clicking through the web does not read pages word-for-word, as studies by web-usability gurus Dr. John Morkes and Jakob Nielsen revealed (1997, Text Should be Scannable section, para. 1); persons reading web pages want instead, as Morkes and Nielsen found, pages that are "concise, scannable and objective" (1997, Abstract section, para. 1). Further, an eye-tracking study, which followed people's eye movements as they looked at various news websites, uncovered the features of websites that engage readers the most (Outing & Ruel, n.d.) – these features match closely with the ideal page layout for paper documents.

Along with the addition of web-based research are design principles for readers with learning differences. "[US] Government statistics show 25,000,000 Americans--one in ten--are functionally illiterate" (Davis & Braun, 1998, para. 1). In elementary schools, approximately 15-20 percent of students "have significant problems and continuing difficulties with reading fluency, comprehension, and spelling" (Tynan, 2003, Frequency section, para. 1).

Dyslexia,<sup>7</sup> an example of a learning difference, is "an inherited condition that makes it extremely difficult to read, write, and spell" (Barton, 1998, Simple Definition section, para. 1), and "may include problems in reading comprehension and reduced reading experience that can impede growth of vocabulary and background knowledge" (Barton, 1998, Research definition used by the National Institutes of Health section, para. 4).

<sup>&</sup>lt;sup>7</sup> The subject of dyslexia, while important, is only a minor element of this thesis and is explored only briefly. For more information, see References for some excellent sources.

It is very possible that analysts will be unaware if their reader has a learning difference. In the case of dyslexia, for example,

"No matter how talented they are, adult dyslexics are often secretive and defensive. They write down inverted phone numbers and financial figures. They can spend an hour trying to decipher a memo. They hide their illiteracy and get other people to read and write for them -- a subterfuge invented to get by in school. Many get headaches from trying to read accurately" (Davis & Braun, 1998, para. 7).

The purpose here is not to dissect the changes the Intelligence Community has experienced over the years or to launch a discussion of the fundamentals of web design or learning differences. The intent is merely to point out the fact that the concepts of Form and Content *have* changed so that effective communication now requires writers to look much more broadly than they have in the past. For this reason, this next section provides a holistic examination of writing guidelines, including guidance for preparing content for the Internet and for a variety of different reading levels. In short, the idea of Form and Content sounds simple, but it is not.

# A Brief Introduction To The Style Manuals

Within the context of this paper, it is neither possible nor useful to compile and compare every style manual ever written, and so this section examines only seven. These carefully selected manuals, however, are representative of the three sectors – Business, Law Enforcement (LE) and National Security – discussed in the previous section. Also included are manuals addressing technical, journalistic and general writing. They therefore cut across boundaries, and comprise:

- two military manuals;
- one business manual;
- one overtly intelligence manual;
- one engineering manual;
- one manual for journal submissions; and
- the venerable Strunk<sup>8</sup> manual.

Missing from this list is a style guide directly from the LE sector. The reason is that LE does not have its own style manual, and instead uses "a combination of the JMIC [Joint Military Intelligence College] and academic styles" (2005, para. 4), according to Dave Grabelski, former Law Enforcement Analyst and current LE Intelligence professor at Mercyhurst College. The second military manual (a US Army manual) here serves as proxy for a LE style manual.

Also missing from the list is a primarily academic manual – one that expounds the virtues of page length, character development, general to specific paragraph development, and long introductions that slowly build to a conclusion. It is clear from the prior section that decisionmakers do not want their analysts to employ this academic writing style and so such manuals are purposefully not included.

Below is a brief explanation of each of the seven manuals, presented in alphabetical order according to title.

# Action Officer: Staff Writing, by John Beckno for the US Army Training and Doctrine Command (n.d.)

John Beckno's *Action Officer* is a comprehensive and very readable package that the US Army Training and Doctrine Command made available "to viewers of the Plain Language Action Network and others interested in improving their power of expression" (n.d., Preface section, para. 1). The information derives from that presented in the *Action Officer Development Course* "consisting of 11 lessons and 5 appendices

<sup>&</sup>lt;sup>8</sup> This thesis uses the original version of *The Elements of Style*, written by William Strunk, Jr. alone, and not the updated version that includes additions and an introduction by E.B. White.

that cover staff processes and communication skills, including writing" (Beckno, n.d., Preface section, para. 3).

# Administration: Staff Procedures, United States Army Materiel Command (USAMC) (2003)

The USAMC's 2003 release of *Administration: Staff Procedures* is a highly detailed account of proper procedures and practices to follow when writing and submitting documents within the Army Materiel Command.

# Business Writing Resource Kit, by Dr. Craig M. Sasse (2000)

Dr. Craig M. Sasse's *Business Writing Resource Kit* is an end-to-end strategy for writers that takes them through the entire writing process, beginning with the pre-drafting stage – choosing a topic, brainstorming, analyzing the audience – to writing, revising, editing, designing page layout, and finally, submitting the document.

# Journal of College Admission Writer's Guide and Tips, by the National Association for College Admission Counseling (NACAC) (n.d.)

The submission guidelines for NACAC's *Journal of College Admission* – which serves as a discussion vehicle for college admission counseling professionals – provides writing tips for potential contributors. While the guidelines cover a range of issues, from choosing an appropriate topic to minute form and content details, NACAC spends much time explaining topics related to proper grammar.

# Style Manual and Writers Guide for Intelligence Publications, Sixth Edition, by the Central Intelligence Agency (1999)

This continuously updated style manual serves to guide the writing in the Central Intelligence Agency (CIA), and covers subjects literally from 'A' – abbreviations, to 'Z' – zero, and everything in between.

# The Elements of Style, by William Strunk, Jr. (1999)

Strunk originally wrote this classic style guide in 1918; in 1999, Bartleby.com made the content available via the Internet. Bartleby.com writes:

"Asserting that one must first know the rules to break them, this classic reference book is a must-have for any student and conscientious writer. Intended for use in which the practice of composition is combined with the study of literature, it gives in brief space the principal requirements of plain

English style and concentrates attention on the rules of usage and principles of composition most commonly violated" (Bartleby.com, 1999, para. 1).

# Writing Guidelines for Engineering and Science Students, by Alley, M., Crowley, L., Donnell, J., & Moore, C., Eds. (2004)

Written for the very specific audience of engineering and science students, Alley, Crowley, Donnell, & Moore's (Editors) 2004 publication *Writing Guidelines for Engineering and Science Students* "are designed to help students communicate their technical work. To that end, these guidelines contain advice, models, and exercises for common writing and speaking assignments in engineering and science" (Alley et al., 2004, para. 1).

# A Brief Note On The Resultant Rules

At the end of each 'subject' discussed below are two things. First is a conclusion, which evaluates the style manuals' advice as compared to what academia, science and experts suggest, and, where applicable, factors in what decisionmakers say they want. Second is a "rule", derived from this review of the academic, scientific and expert research as well as the style manuals. The weighting of these rules differ from those in the previous section where interest was measured by the number of decisionmakers who supported each maxim.

To establish adequately a "rule", it is important to validate and weight the evidence that contributed to it (Jacquet & Abran, 1998, Substep 2 section, p. 3). This document does so in two ways: first, by weighting source reliability of the academic, scientific and expert information; second, by conveying analytic confidence in the conclusion. The average of these two scores yields the "strength" of the resultant rule.

All scores derive solely from data in the Academia, Science And Experts section. Information from the style manuals is not included as they are not under consideration when developing a rule; the style manuals are merely a reflection of best practices.

Outlined briefly below are the criteria that determine the three scores: source reliability, analytic confidence and strength.

# Source Reliability: Explained

Source Reliability scores on a ten-point scale, where "1" represents a low reliability and "10" denotes a high reliability in the sources taken together.

Each source is weighted independently according to the scale below, where Personal Commentary receives one out of three possible points, Businesses or Corporations and Academics receive two out of three possible points, and Experts-in-the-Field, Peerreviewed Articles, Analytical Studies, and Scientific Experiments receive three out of three possible points. (Where applicable, the reliability score for individual sources directly follows the citation in the Bibliography section.)

The sum of these points in a particular section, divided by the number of possible points (that is, number of sources multiplied by 3) in the section and multiplied by 100, results in a final score out of ten.

Source Reliability = (total points/n sources\*3)\*100

# One (1) Point:

#### **Personal Commentary**

Reports, comments or other documents written by an individual whose profession indirectly or not at all relates to the field in question, and who supports their opinion by personal experience or the experience and opinions of a second party.

# Two (2) Points:

#### **Business/Corporation**

A corporate entity who specializes in and whose financial welfare depends on their success in the field in question or an individual writing on behalf of such an entity.

#### **Academics**

Individuals responsible for teaching the field in question and write about it based on their own criteria and teaching material.

# Three (3) points:

#### **Expert-in-the-Field**

An individual who has become an expert and leading authority in the field through education, experience and practice.

#### **Peer-reviewed Article**

The article or document has passed "the scrutiny of reviewers who are experts in the field or on the research topic" (Walden Library, 2003, What is a Peer Reviewed Article? section, para. 1).

# **Analytical Studies**

The author(s) has compiled a large amount of data, derived from numerous sources directly related to the field in question, and, after analysis, created a set of general guidelines applicable in the majority of cases related to that field.

#### **Scientific Experiments**

The author's observations/conclusions derive from a scientific experiment characterized by:

- "evaluating one or more important and relevant hypotheses" (NCI, 2003, Category A Experiments section, para. 3);
- "using an appropriate number of representative and randomized subjects" (NCI, 2003, Category A Experiments section, para. 3);

- "using tasks that people typically perform" (NCI, 2003, Category A Experiments section, para. 3);
- "applying appropriate statistical methods" (NCI, 2003, Category A Experiments section, para. 3); and
- "reporting with sufficient detail to allow replication" (NCI, 2003, Category A Experiments section, para. 3).

# **Analytic Confidence: Explained**

Analytic Confidence indicates the confidence level that the Conclusion is "true". A score of "1" signifies low confidence in the Conclusion, whereas "10" corresponds to the highest level of confidence.

Analytic Confidence depends on two factors: reliability of the sources and the number of sources saying the same thing. For example, a large number of moderately- to highly-reliable sources all stating that brevity is important would lead to a high level of *Analytic Confidence*.

This approach assumes some level of initial error and seeks to narrow the initial error by reviewing multiple sources. The consistency of the sources tends, in this case, to help confirm the accuracy of the rule (Schrage, 2005, para. 16; Pfautz, Fouse, Roth, & Karabaich, 2005, p. 5).

# Strength: Explained

It is important to show the strength of the Rule itself; that is, the validity of the final product derived from the analysis of the academic and scientific sources. *Strength* is therefore the aggregate of scores from *Source Reliability* and *Analytic Confidence*, and displays numerically the soundness of each Rule.

# Academia, Science And Experts On: Content "It takes hard writing to make easy reading."

Robert Louis Stevenson, Scottish novelist, essayist and poet

Style manuals include many tips and guidelines on how writers can write well and what common content errors they should avoid. All of these tips fall into three broad categories:

- grammar and spelling;
- integrity; and
- quality.9

Grammar and spelling, while largely self-explanatory, also includes lessons regarding acronyms and passive voice. Style manuals address integrity by requesting writers to be accurate and to be credible and responsible for their work. A quality document is one that is reader-friendly, that is, it exhibits the qualities of bottom line up front (BLUF), brevity, clarity, and consistency, and tailors its content and style to the audience.

# **Grammar & Spelling**

Two additional categories add to the two obvious ones (that is, grammar and spelling): acronyms and passive voice.

# Acronyms According To...

# Style Manuals:

Regarding acronyms, NACAC highlights to writers, "just because you can remember what they stand for, doesn't mean your reader will", and cautions writers not to condescend (n.d., p. 5). USAMC suggests writers avoid "acronyms and abbreviations whenever possible" (USAMC, 2003, p. D-2), but that, if used, writers must spell out the acronym on its first use, followed by the acronym in parentheses (USAMC, 2003, p. D-1). The CIA also supports this contention (1999, pp. 4-5).

#### Academia, Science And Experts:

Offering tips to make White Papers succeed, Klariti Writing Services, who provide writing services across Ireland and the European Union (EU), cautions writers to avoid terminology and, if they must use acronyms, to explain their meaning at the beginning of the document (Klariti, n.d., Avoid Terminology section, para. 1). "Readers don't like

<sup>&</sup>lt;sup>9</sup> All sub-categories within each of these three are ordered alphabetically.

been patronized. Technical terms without a clear definition will lose [the reader's] confidence in you and your products... [T]hey will stop reading and go somewhere else" (Klariti, n.d., Avoid Terminology section, para. 2).

Teresa O'Sullivan, Doctor of Pharmacy (PharmD), a lecturer at University of Washington's Department of Pharmacy, states, "It is necessary to define all acronyms that you use the first time you use that abbreviation" (n.d., General rules for word choice section, p. 1).

Source Reliability: 6.7/10

#### **Conclusion:**

The guidance found in style manuals is correct, as it follows the basic tenets of what academia, science and experts recommend. Intelligence decisionmakers do not specifically mention proper acronym use, though this rule is inherent in the 'Clarity' maxim.

**Analytic Confidence: 7/10** 

ule #1: Spell out acronyms on first use or avoid altogether.

(Strength: 6.85/10)

# Grammar According To...

#### Style Manuals:

Four of the style manuals touted generally proper grammar, and noted specifically that good writing should:

- have clear references/antecedents (for example, "'Mary' is the antecedent of 'her' in the sentence 'I'll give this to Mary if I see her') (NACAC, n.d., p. 1);
- check for: "material omission; abstract, ambiguous or misplaced words; unusual terms or obscure references; unfulfilled promises; murky antecedents; non parallel structure" (NACAC, n.d., p. 2);
- use proper grammar, punctuation and spelling to enable the reader to quickly understand the message and not be distracted by errors (Beckno, n.d., p. 11-4; Sasse, 2000, p. 5);

- have no distracting errors in word choice (Sasse, 2000, p. 4);
- employ about a 50-50 mix of dependent (including subordinating) and independent clauses (see below for more information) (Sasse, 2000, p. 21); and
- be free of awkward sentences (Sasse, 2000, p. 30; Strunk, 1999, Rule 14 section, para. 4).

"If the writer finds that he has written a series of [awkward] sentences..., he should recast enough of them to remove the monotony, replacing them by simple sentences, by sentences of two clauses joined by a semicolon, by periodic sentences of two clauses, by sentences, loose or periodic, of three clauses—whichever best represent the real relations of the thought" (Strunk, 1999, Rule 14 section, para. 5).

A notable grammatical issue that Sasse brings up is that of writers' overuse of independent clauses, which make for choppy writing. Any sentence that can stand alone is an independent clause (Sasse, 2000, p. 21, para. 5). Including too many of these is "a data dump. Readers have trouble with data dumps because each sentence represents a new idea and appears to have equal significance" (Sasse, 2000, p. 21). Subordinating clauses are useful writing tools as they put two or more of these independent sentences together to make one dependent on the other. For example, in the sentence,

"Despite drinking four cups of coffee, the student could not stay awake",

coffee consumption is dependent on the much larger concept of wakefulness.

Writing this sentence as two independent clauses looks like:

"The student drank four cups of coffee. The student could not stay awake."

The first version, using subordination, "allows the reader to assimilate facts and ideas in a more precise, orderly way" (Sasse, 2000, p. 21).

# Academia, Science And Experts:

In a project designed to find out recruiters and headhunters' likes and dislikes in resumes they receive, ResumeDoctor, one of the largest companies specializing in fixing and advising resumes, interviewed several hundred headhunters and compiled the results into the top twenty "pet peeves" (Worthington, n.d., What Recruiters Are Saying About Resumes section, para. 1).

The number one complaint, out of twenty, was spelling errors, typos and poor grammar. One recruiter notes, "By far, the biggest complaint I have is related specifically to grammar. Resumes are supposed to not only reflect the experiences of professionals, but

additionally they serve as examples of communication style. Run on sentences, poor spelling, mixed verb tenses, all of these things and more are a serious reflection on the individual!" (Worthington, n.d., # 1 - Spelling Errors, Typos and Poor Grammar section, para. 5).

"[U]nderstand that grammar COUNTS" (Gocsik, 2005, Becoming Your Own Grammar Tutor section, para. 7), asserts Karen Gocsik, PhD, Associate Director of the Writing Program and adjunct assistant professor of English at Dartmouth College. She stresses the importance of grammar skills to the College's students:

"Your professors expect writing that is correct. They are irritated when you give them papers plagued by error.... Some professors feel that you should have mastered grammar before college and that it is not their responsibility to point out your mistakes to you..... [I]t is your responsibility to master the rules of the language that you speak and write. Learn them well" (Gocsik, 2005, Becoming Your Own Grammar Tutor section, para. 8).

Gocsik describes grammar as "the ever-evolving structure of our language, a field which merits study, invites analysis, and promises fascination" (Gocsik, 2005, A Brief Introduction section, para. 1) and "an understanding of how language works, of how meaning is made, and of how it is broken" (Gocsik, 2005, A Brief Introduction section, para. 3).

Marie Rackam, a retired English teacher who developed an 15-time award-winning curriculum for grammar and punctuation (See Annex 4 for a full list of awards), reflects on the importance of grammar in enhancing creativity. She calls grammar "a technique" and "a tool that can enhance creativity – not stifle it" (Rackam, n.d. para. 5), and asserts that by knowing proper grammar rules, writers will be able to recognize 'errors' and adjust words, phrases or sentences to sound better.

"[I]t was so helpful, from a teaching point of view, to be able to say, 'Here you used an adjective where you should have used an adverb;' or, 'at this point you used a principal verb without an auxiliary verb;' or, 'if you place the subject at the end of this sentence it will improve the flow of your story'" (Rackam, n.d. para. 5).

Don Dewsnap, professional writer for almost three decades and author of *The Basic Glossary of Grammar*, contends that grammar is not a set of boring rules, it is a guideline for "how to arrange words to get your meaning across clearly" (2005, Gem Number One section, para. 1) that, if improperly applied, may translate into a loss of sales (business professionals constitute Dewsnap's audience). He demonstrates his point: "When you write a sales letter, if you are not getting your message across as clearly as you could, you are not getting the results you could (2005, Gem Number One

section, para. 3).... When you misuse an adjective, or mix up the tenses of verbs, your message gets muddled" (2005, Gem Number One section, para. 4).

As a "New York-based nonprofit that does opinion surveys on a range of issues" (Public Agenda, 2005, What Is Public Agenda section, para. 10), Public Agenda's annual (since 1998) survey queries teachers, students, parents, professors, and employers on their perceptions of education and young people's skills to determine "whether the school standards movement is making headway" (Public Agenda, 2001, Reality Check 2002 section, para. 1).

The 2002 version – Reality Check 2002 – found that "Employers and professors still say that too many of today's high school graduates lack basic skills" such as writing (Public Agenda, 2001, Finding Five section, para. 1).

When asked how they would rate recent job applicants or freshman or sophomore students on grammar and spelling, 73 percent of employers and 74 percent of professors responded "fair" or "poor" (Public Agenda, 2001, Finding Five section, para. 3). Asked the same question, this time regarding the ability to write clearly, 73 percent of employers and 75 percent of professors responded "fair" or "poor" (Public Agenda, 2001, Finding Five section, para. 3).

Source Reliability: 8.7/10

#### Conclusion:

Based on academic and scientific commentary, style manuals are correct in advising proper grammar from writers. This skill transcends a mere 'set of boring rules' and allows writers – who use it correctly – to express themselves more clearly and creatively. Although grammar errors reflect poorly on the writer, according to professors and recruiters the majority of job applicants and college students perform below acceptable levels in this area. Proper grammar is implicit in the maxim demanding 'Clarity', which 21 decisionmakers support.

**Analytic Confidence: 9/10** 

ule #2: Proper grammar matters. (Strength: 8.85/10)

# Passive Voice According To...

### Style Manuals:

Six of the style manuals, plus a seventh – BusinessWriting.com, caution writers against using passive voice in their writing. According to Strunk, the "active voice is usually more direct and vigorous than the passive", for example, writing "I shall always remember my first visit to Boston"

is much better than

"My first visit to Boston will always be remembered by me" (1999, Rule 11: Use the Active Voice section, paras. 1-4).

Consequently, if the writer omits "by me" in the latter sentence for brevity's sake, the sentence

"My first visit to Boston will always be remembered"

becomes indefinite (Strunk, 1999, Rule 11: Use the Active Voice section, paras. 5-7) – that is, readers wonder *by whom* will the Boston visit always be remembered? "[I]s it the writer, or some person undisclosed, or the world at large, that will always remember this visit" (Strunk, 1999, Rule 11: Use the Active Voice section, para. 7)?

# When using passive voice:

- the writing is unclear/vague (BusinessWriting.com, n.d., Use Passive Voice Sparingly section, para. 1; Sasse, 2000, p. 20);
- the actor's identity is 'secret' as passive voice leaves out subject (Beckno, n.d., p. 11-6; BusinessWriting.com, n.d., Use Passive Voice Sparingly section, para. 1; NACAC, n.d., p. 3);
- the writing is hard to understand, and sounds awkward or evasive (BusinessWriting.com, n.d., Use Passive Voice Sparingly section, para. 2; NACAC, n.d., p. 3);
- readers "may interpret passive voice as an attempt to avoid admitting responsibility" (BusinessWriting.com, n.d., Use Passive Voice Sparingly section, para. 2)
- the sentence is longer (NACAC, n.d., p. 3; Sasse, 2000, p. 4) as it uses 20 percent more words (Beckno, n.d., p. 11-6); and
- takes longer to read (Beckno, n.d., p. 11-6).

On the other hand, the active voice:

- is more direct (BusinessWriting.com, n.d., Use Passive Voice Sparingly section, para. 4);
- is more concise (Beckno, n.d., p. 11-6; BusinessWriting.com, n.d., Use Passive Voice Sparingly section, para. 4) and therefore takes less time to read (Beckno, n.d., p. 11-6); and
- sounds more responsible (BusinessWriting.com, n.d., Use Passive Voice Sparingly section, para. 4), especially because it identifies the agent (Beckno, n.d., p. 11-6); and

"Not surprisingly, professional writers use a majority of active verbs (65-80%)" (Sasse, 2000, p. 20), and Beckno, the CIA and the USAMC recommend using the active voice in most sentences (Beckno, n.d., p. 11-4; CIA, 1999, p. 5; USAMC, 2003, p. D-1).

BusinessWriting.com and Strunk advocate passive voice only sparingly (n.d., Use Passive Voice Sparingly section, para. 1; 1999, Rule 11: Use the Active Voice section, para. 8). The former explains: "Usually use passive voice when you do not know the actor, you want to hide the identity of the actor, or the actor is not important to the meaning of the sentence" (n.d., Use Passive Voice Sparingly section, para. 5).

# Academia, Science And Experts:

David R. Davies, associate professor of journalism and Interim Director of the School of Mass Communication & Journalism at the University of Southern Mississippi, advises writers to always use the active voice unless they "have good reason to do otherwise" (Making Words Sing section, para. 8). The active voice is "more natural, more direct and more vigorous than the passive, and is the natural voice, the one in which people usually speak or write" (Making Words Sing section, para. 8). It is also "less likely to lead to wordiness or ambiguity" (Making Words Sing section, para. 8). Davies recommends writers to "say who does what", to make writing more active (Making Words Sing section, para. 8).

In *Self-Editing Quick Tips for Tightening Your Copy*, Edward H. Moore, Public Relations teacher and counselor and co-author of *The School and Community Relations*, recommends writers "purge the passive voice" (2004, Purge the passive voice section, para. 1) so their sentences will be tighter and, as a result, "easier for readers to decode" (2004, para. 2).

As saving "just a few words can make a big difference", he provides an example (below), where the first sentence is passive, the second, active (and therefore shorter).

The sentence,

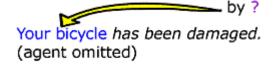
"A significant budget reduction was accomplished by the research department" (Moore, 2004, Purge the passive voice section, para. 2)

#### becomes

"The research department cut its budget significantly" (Moore, 2004, Purge the passive voice section, para. 3).

A grammar guide produced by Purdue University's Online Writing Lab promotes using the active voice for the majority of sentences as they generally will be "clearer and more direct than those in passive voice" (Purdue & Hansard, n.d., Choosing Active Voice section, para. 1). "[O]veruse of passive voice or use of passive voice in long and complicated sentences can cause readers to lose interest or to become confused" (Purdue & Hansard, n.d., Choosing Active Voice section, para. 1).

Purdue (graphically, thanks to Michelle Hansard) demonstrates how passive constructions allow writers to avoid personal responsibility. Consider the following example (Purdue & Hansard, n.d., Choosing Active Voice section, para. 2) in the passive voice:



The writer has neglected to include the identity of the agent – or whatever is responsible for damaging the bicycle. In the *active* form,



the agent becomes clear (Purdue & Hansard, n.d., Choosing Active Voice section, para. 2). "I" is responsible for the damaged the bicycle.

Charles Darling, English Professor at Capital Community College in Connecticut, finds that many writers employ the passive voice "to avoid responsibility" (n.d., Passive and Active Voices section, para. 2). For example,

"At a White House press briefing we might hear that 'The President was advised that certain members of Congress were being audited' rather than 'The Head of the Internal Revenue service advised the President that her agency was auditing certain members of Congress' because the passive construction

avoids responsibility for advising and for auditing" (Darling, n.d., Passive and Active Voices section, para. 2).

He notes, "There is nothing inherently wrong with the passive voice, but if you can say the same thing in the active mode, do so.... Your text will have more pizzazz as a result" (Darling, n.d., Passive and Active Voices section, para. 1).

Except when the writer wants "to hide the agent or obscure what occurs" (Wheeler, 2005, para. 6), Dr. L. Kip Wheeler, assistant professor at Carson-Newman College's English Department, recommends the active voice in all cases, for several reasons (Wheeler, 2005, para. 7).

For one, active sentences "are often more concise" and frequently use thirty-forty percent fewer words (Wheeler, 2005, para. 8). Passive voice also uses "weak" or abstract words, like "is/am/are/was/were/being/been", or "the", "by" and "of" (Wheeler, 2005, para. 13), and "can be confusing or unclear, especially in long sentences" (Wheeler, 2005, para. 23). Additionally, the agent is missing from the sentence, and "may truly be unknown" (Wheeler, 2005, para. 30). Wheeler notes, too, writing that uses the passive voice is often stilted, "especially in academic arguments in which the student dons a 'scholarly' tone" (2005, para. 36).

Lastly, "Linguistic studies show that native English speakers are better able to remember material they read in active voice than the same material in passive voice.... If you want your readers to remember what you write, use active voice" (Wheeler, 2005, para. 40).

Herb Shapiro, Professor and Writing Program Director at Empire State College in New York, states as one of his *Ten Commandments of Business Writing*, to use the active voice (Shapiro, n.d., para. 3). Regarding technical writing, Teresa O'Sullivan, PharmD, a lecturer at University of Washington's Department of Pharmacy, also advocates using active rather than passive voice (n.d., General rules for word choice section, p. 1).

Source Reliability: 6.7/10

#### Conclusion:

It is obvious that using the passive voice results in writing that is less clear and more ambiguous, longer, and shirks responsibility. Writers should use this tense sparingly and only when necessary and intelligence analysts not at all. Academia and science therefore concur with style manuals on this subject. Decisionmakers also express an implicit desire for the active voice, most notably in the maxim demanding 'Clarity', which 21 of them support, and under 'Packaging', which implicitly requests analysts use the active voice to maintain user-friendliness. Writers often use passive voice to hide the source; taking into account intelligence's need to be clear who the actors are,

passive voice is never necessary in an intelligence document, and this rule is a particularly important one.

**Analytic Confidence: 9/10** 

ule #3: Use the active voice at all times in intelligence documents.

(Score: 7.85/10)

# Spelling According To...

It's a damn poor mind that can only think of one way to spell a word.

Andrew Johnson

### Style Manuals:

Beckno writes, "Writing must be error free in spelling and punctuation" (n.d., p. 11-4) and the USAMC instructs writers to use the "Spell Check' function on EVERY document" (2003, p. D-1). It is *possible* that the five other manuals fail to mention the value of good spelling as they assume their readers already know this.

### Academia, Science And Experts:

In a project designed to find out recruiters and headhunters' likes and dislikes in resumes they receive, ResumeDoctor, one of the foremost respected authorities on resumes, interviewed several hundred of them and compiled the results into the top twenty "pet peeves" (Worthington, n.d., What Recruiters Are Saying About Resumes section, para. 1).

"Hands down, without a doubt, the NUMBER ONE complaint is Spelling Errors, Typos and Poor Grammar" (Worthington, n.d., #1 - Spelling Errors, Typos and Poor Grammar section, para. 1). Some of the comments from recruiters included in the project follow:

- "Spelling Errors drive us insane.... If there are careless errors, it directly reflects on the candidate. Our policy is, if they haven't taken the time to proof read their resume and correct spelling errors, delete!" (Worthington, n.d., #1 Spelling Errors, Typos and Poor Grammar section, para. 2);
- "It is surprising to me how many resumes I receive for \$50K + positions that have misspellings, incorrectly used words (their vs. there) and poor grammar. If

an individual sends me a document meant to represent his/her acumen and skill, and does not take the time to insure that it is correct, then I am left to interpret this to mean poor attention to detail and lack of sincere interest" (Worthington, n.d., # 1 - Spelling Errors, Typos and Poor Grammar section, para. 3);

- "If your resume has a mistake, that is reason enough not to get the job. This is a document that you have hopefully worked on for a long time and had several people go over. If this document has mistakes what does that say about the rest of the work that you do?" (Worthington, n.d., #1 Spelling Errors, Typos and Poor Grammar section, para. 4);
- "Resumes are supposed to not only reflect the experiences of professionals, but additionally they serve as examples of communication style. Run on sentences, poor spelling, mixed verb tenses, all of these things and more are a serious reflection on the individual!" (Worthington, n.d., # 1 Spelling Errors, Typos and Poor Grammar section, para. 5).

Marie Rackam, a retired English teacher who developed an award-winning curriculum for grammar and punctuation, strongly advocates proper spelling:

"Spelling, like grammar and punctuation, is a technique of English. Spelling is an important communication skill. In my opinion, since the advent of the Internet, it is even more important because words on a web page may determine what people think of you and your abilities. Spelling, grammar, and punctuation errors will make you appear less credible to your audience" (n.d., para. 8).

A 1987 British survey of fifty random people asked "How important do you think it is to spell correctly?" and gave the respondents three possible answers: very important, quite important or not important (Jolly, 1988, Conclusion section, para. 4). Having first asked the participants how well they thought they could spell, the researchers concluded, "Both good spellers and average spellers saw correct spelling as important in the same proportion. Only poor spellers were inclined to see it as not important" (Jolly, 1988, The Results section, para. 5).

The actual results showed that:

- 60% of people surveyed felt it is Very Important to spell correctly;
- 36% felt it is Quite Important; and
- 4% said correct spelling is Not Important (Jolly, 1988, The Results section, para.
   4).

A "superior paper" (that is, an A or A- paper) has "minimal to no spelling errors" (2004, The Superior Paper (A/A-) section, para. 7), asserts Assistant Professor of Psychology at Rochester Institute of Technology G. Scott Acton, PhD in his grading guidelines. A

"good paper" (B+/B) has "some minor spelling errors" (Acton, 2004, The Good Paper (B+/B) section, para. 6), and the "needs help" paper (C/C-) contains "frequent major errors in...spelling" (Acton, 2004, The "Needs Help" Paper (C/C-) section, para. 7).

CustomPapers.com, while a potentially controversial service as it provides college students with customized term papers, recognizes, "A good paper can be detrimentally affected by poor spelling and grammar" (CustomPapers.com, n.d., para. 15). The service cautions students to proofread their papers for spelling and grammar errors, as "brilliant ideas are wasted if the teacher has a hard time reading it. Your teacher will end up feeling frustrated by spelling errors and take his/her frustration out on your grade" (CustomPapers.com, n.d., para. 15). Moreover, CustomPapers.com recommends students review their paper even after using a computer spell-check as it may miss particular errors (CustomPapers.com, n.d., para. 18). "A good paper indicates that the student has paid careful attention to its presentation" (CustomPapers.com, n.d., para. 18).

Source Reliability: 8.7/10

#### **Conclusion:**

The two style manuals are correct in demanding writers spell correctly. In academia, poor spelling leads to poor grades (and possibly frustrated teachers). As ResumeDoctor discovered, recruiters regard spelling errors as a reflection of a person's personality, attention to detail and work ethic, and are both glaringly obvious and wholly unacceptable. Overall, spelling errors influence a reader's perception of the writer's credibility and care. This subject is an implicit part in the decisionmakers' mandate for 'Accuracy', and perhaps explicit regarding the analyst's correct spelling of names, for example. It is also implicit in 'Clarity' and 'Packaging', where one decisionmaker specifically mentioned that correct spelling was part of good packaging. Spelling becomes even more important as length decreases. There should be *no* mistakes in a one-page paper, for example.

**Analytic Confidence: 9.5/10** 

ule #4: Ensure correct spelling. (Strength: 9.1/10)

# Integrity

Two subjects make up the Integrity category: accuracy and credibility or responsibility.

# **Accuracy According To...**

### Style Manuals:

When discussing the submission process, NACAC makes clear that it holds writers responsible "for the accuracy of material submitted including statistics, references, quotations, and tables" (n.d., p. 1).

### **Academia, Science And Experts:**

"Lying or Misleading Information" is the number twelve pet peeve that recruiters and headhunters cited in ResumeDoctor's intensive survey. More often than lying, job seekers simply stretch the truth to sound more favorable.

The "most common misleading information" they put on their resumes are (Worthington, n.d., # 12 Lying or Misleading Information section, para. 2):

- inflated titles (Worthington, n.d., # 12 Lying or Misleading Information section, para. 3);
- inaccurate dates "to cover up job hopping or gaps of employment" (Worthington, n.d., # 12 Lying or Misleading Information section, para. 3);
- incomplete post-secondary degrees, "inflated education or 'purchased' degrees that do not mean anything" (Worthington, n.d., # 12 Lying or Misleading Information section, para. 3);
- inflated salaries (Worthington, n.d., # 12 Lying or Misleading Information section, para. 3);
- inflated accomplishments (Worthington, n.d., # 12 Lying or Misleading Information section, para. 3); and
- "[o]ut and out lies in regards to specific roles and duties" (Worthington, n.d., #
   12 Lying or Misleading Information section, para. 3).

The bottom line: "Present your resume accordingly, be TRUTHFUL" (Worthington, n.d., # 12 Lying or Misleading Information section, para. 5).

Teresa O'Sullivan, PharmD, a lecturer at University of Washington's Department of Pharmacy, states that technical writing emphasizes accuracy, facts and precision (n.d., Technical writing section, p. 1). The main goal is to "communicate facts, explain procedures, [and] critically evaluate evidence" (n.d., Technical writing section, p. 1).

Dr. John Morkes, a partner at Expero, Inc., a user experience consulting firm, and Jakob Nielsen, Ph.D., co-founder and principal of the Nielsen Norman Group (who New York Times called "the guru of Web page usability"), conducted three web-usability studies in 1997. Two studies determined how users read web pages and their likes and dislikes, and the third assessed the benefits of the most promising writing styles identified in the previous studies.

One of their study's three main conclusions revealed that web users "prefer factual information[;] users detest anything that seems like marketing fluff or overly hyped language" (Morkes & Nielsen, 1997, Introduction section, para. 4).

Source Reliability: 8.9/10

#### Conclusion:

Academia, science and experts support the sole style manual's request for accuracy. The former, however, explores the subject in more detail and requires not only the truth, but also the whole, un-manipulated truth. That these details are exactly what decisionmakers want, according to the maxims for 'Accuracy' and 'Unbiased', only strengthens this rule and its importance to intelligence analysis.

**Analytic Confidence: 9/10** 

ule #5: Present data accurately and in its entire, un-manipulated

form. (Strength: 8.95/10)

# Credibility/Responsibility According To...

# Style Manuals:

The issue of responsibility arises in the Passive Voice section, where using this type of sentence construction leaves out the actor and sounds as if the writer is shirking responsibility. Employing the *active voice*, then, is a simple way to own up to responsibility, and the USAMC suggests yet another. In every document, "The last paragraph should be the point of contact, office symbol, and phone number" (2003, p. D-1).

NACAC evaluates submissions based on whether the subject matter "[p]romotes sound professional practices and ethics" (n.d., p. 1), and the CIA urges writers to define their evidence "as specifically as possible", identifying the source, when the writer obtained it, and how reliable they believe it is (1999, p. 47).

### **Academia, Science And Experts:**

Douglas E. Welch, freelance writer and columnist, contends it is important for writers to sign their work, for a number of reasons. First, this action demonstrates pride in the work and shows they "find it important and worthwhile" (Welch, 2003, Take pride in your work section, para. 1). "If you don't take your work seriously, why should anyone else?" (Welch, 2003, Take pride in your work section, para. 1).

Second, beyond personal pride, a writer signing their work "gives readers or users a place to call if they have questions about the report...or any of the assumptions used in creating it" (Welch, 2003, Take pride in your work section, para. 2). It also allows readers to become familiar with the writer's name, especially if they otherwise have no occasion to do so (Welch, 2003, Take pride in your work section, para. 2). Welsh advises writers to ensure readers know how to contact them directly, and concludes, "Do everything you can to personalize your service so that your users know who is directly responsible for helping them" (Welch, 2003, Take pride in your work section, para. 3).

On another avenue, a writer can display their credibility in two ways: implicitly and explicitly. Writers attain explicit credibility through their document's appearance – whether through good-looking graphics, attention to detail or use of appealing colors.

Ruth Anne Robbins, Clinical Associate Professor of Law at Rutgers School of Law, Camden, argues that visual effects influence "the credibility of the writer and the writer's argument" (2004, p. 111). Here, a reader "who knows something about basic design principles may react negatively to a document that does not incorporate those basic principles" (Robbins, 2004, p. 111).

Implicit credibility comes in part through good writing with strong sourcing. In Dr. John Morkes and Jakob Nielsen's web-usability study, seven of nineteen participants considered credibility an important concern, since, typically, a website's publisher and the sources of the information are unclear or not immediately known (1997, Credibility is an Important Issue on the Web section, para. 1). When reading documents, eighty-three percent of the participants liked having hyperlinks available in-text for the "ability to go deeper for more information" if they wanted to (Morkes & Nielsen, 1997, Hypertext is Well-Liked section, para. 1).

One participant, considering both explicit and implicit credibility when judging websites, noted,

"A magazine that is well done sets a certain tone and impression that are carried through the content. For example, National Geographic has a quality feel, a certain image. A website conveys an image, too. If it's tastefully done, it can add a lot of credibility to the site" (Morkes & Nielsen, 1997, Credibility is an Important Issue on the Web section, para. 2).

Source Reliability: 8.9/10

#### Conclusion:

Though the style manuals do not say much on the subjects of credibility and responsibility, the USAMC requirement that writers include their contact information on their work and the CIA's push for clearly defined sourcing ties with what academia calls for. What the style manuals do not specifically address, that academia and science mention, is the idea that a well-written, properly sourced document adhering to design principles conveys a level of credibility on its own. Further, in the maxims for 'Accurate' intelligence and 'Accountability', the decisionmakers' demands both explicitly and implicitly include the ideas of credibility and personal responsibility.

Analytic Confidence: 6.5/10

ule #6: Signed documents, proper sourcing, and adherence to

design principles establishes author credibility and responsibility. (Strength: 7.7/10)

# Quality

Indicators of quality include: bottom line up front (BLUF), brevity, clarity, consistency, and a subject and style tailored for the reader.

# Bottom Line Up Front According To...<sup>10</sup>

# Style Manuals:

Five of the style manuals advocate putting the bottom line up front (BLUF), either in the form of topic sentences or as a summary paragraph at the start of the document. NACAC bluntly states, "Don't brood about impressive openings. Get to the point", and asks writers to make sure their documents have a topic sentence or paragraph (n.d., p. 2). Strunk goes further to assert that beginning each paragraph with a topic sentence is a rule, as "the object is to aid the reader" (1999, Rule 10 section, para. 1). Using topic sentences enables the reader "to discover the purpose of each paragraph as he begins to read it" (1999, Rule 10 section, para. 1).

Sasse considers paragraphs with topic sentences to be effective ones as they "set up the paragraph...[and] make the organizing idea clear to the reader", and these "should be as specific as possible" (2000, p. 28). If writers include a one-paragraph summary at the start of their report, they must recognize "that it is a summary only if it actually summarizes information that either precedes the summary or follows it" (2000, p. 12).

USAMC advises its officers to address the issue in the first paragraph via a BLUF (2003, p. D-1), and Beckno maintains that writers must put the bottom line up front in order to "meet Army writing standards" (n.d., p. 11-4). "Putting the main point up front allows a reader to review a matter quickly and go on to something else" (n.d., p. 11-13). **Academia, Science And Experts:** 

Offering tips to make White Papers succeed, Klariti Writing Services, who provide writing services across Ireland and the European Union (EU), advocate a strong summary at the start of a document, as "Many readers will read this first" (Klariti, n.d., Summary section, para. 1). The summary should explain the paper's fundamentals and provide an outline of the key points (Klariti, n.d., Summary section, para. 1).

Dr. John Morkes and Jakob Nielsen's studies found that writing that puts the bottom line up front (BLUF) "is useful and saves time" (1997, Users Like Summaries and the Inverted Pyramid Style section, para. 1).

Steve Outing, senior editor at the Poynter Institute for Media Studies, and Laura Ruel, assistant professor in visual communication and multimedia production in the School of Journalism and Mass Communication at the University of North Carolina at Chapel Hill, conducted an eye-tracking study that assessed the effectiveness of web page layouts by following users' eye movements as they encountered a page.

<sup>&</sup>lt;sup>10</sup> While in intelligence documents, BLUF refers to an estimate or likely statement, this is not the case outside the intelligence sector. BLUF, to all others, means literally the bottom line (that is, with no 'estimate'). BLUF is then also known as a topic sentence (when it is a paragraph's 'bottom line') and an executive summary (when the writer summarizes the document in a one-paragraph long 'bottom line up front') and here mean the same thing.

They learned that, for a news blurb, essentially a story's Executive Summary, "most people just look at the first couple of words – and only read on if they are engaged by those words" (Outing & Ruel, n.d., Partial viewing of headlines, blurbs found to be common section, para. 1). They also found, however, that ninety-five percent of participants "viewed all or part of...a boldface introductory paragraph" that accompanied an article (Outing & Ruel, n.d., What about article layout, writing style? section, para. 7).

Pet peeve number seventeen in ResumeDoctor's intensive survey of recruiters and headhunters is resumes with "no easy-to-follow summary". Citing the "hundreds and hundreds of resumes per week" that recruiters receive, resumes must "GRAB the reader from the get go" and "convey a match within 10 seconds" (Worthington, n.d., # 17 - No Easy-to-Follow Summary section, para. 1). "An effective summary section will help the recruiter identify if the job seeker is a viable candidate for the position quicker" (Worthington, n.d., # 17 - No Easy-to-Follow Summary section, para. 1).

Pet peeve number twenty also stresses the importance of putting information up front, and concerns burying important information "so deep into the resume the recruiter will not see it" (Worthington, n.d., # 20 - Burying or Not Including Important Information in the Resume section, para. 1).

If job seekers possess the characteristics required of the job, it is imperative "that they GRAB the recruiter's attention IMMEDIATELY with these skills/ experience" (Worthington, n.d., What Recruiters Are Saying About Resumes section, para. 1). Not doing so considerably "reduces the chances that a recruiter will call" (Worthington, n.d., What Recruiters Are Saying About Resumes section, para. 1). "The best scenario is to customize each and every resume that is sent out and tailor it to the 'hot buttons' that will catch the employer/recruiters attention within 5-10 seconds" (Worthington, n.d., What Recruiters Are Saying About Resumes section, para. 1).

"No recruiter has the time to play Sherlock Holmes or guessing games to figure out a candidate's background.... [They] spend only about 10 seconds 'skimming' through each resume' (Worthington, n.d., What Recruiters Are Saying About Resumes section, para. 1).

Source Reliability: 9.2/10

# Conclusion:

Academia and science supports the style manuals' contention that writers should put their bottom line up front, either in the form of topic sentences, summaries or blatantly obvious key points that grab the reader's attention. Decisionmakers overtly stress their desire for analysts to put the 'Bottom Line Up Front' in general, and this is an explicit part of their desire for user-friendly 'Packaging'.

**Analytic Confidence: 9/10** 

ule #7: Put the bottom line up front. (Strength: 9.25/10)

# **Brevity According To...**

#### **Style Manuals:**

Beckno (n.d., p. 11-4), NACAC (n.d., p. 1) and USAMC (2003, p. D-1) advocate short sentences, words and paragraphs. Army writing standards require an average of 15 words per sentence (at least, less than 20), one- or two-syllables per word, and about one inch depth per paragraph (Beckno, n.d., p. 11-4; USAMC, 2003, p. D-1). In order for readers to understand quickly the writing, it must be concise, using the fewest words to get the point across (Beckno, n.d., p. 11-4). Additionally, "Small, one-syllable words...save writing and reading time, and...increase your power of expression" (Beckno, n.d., p. B-1).

NACAC requires brevity while simultaneously compelling writers to include all necessary information (n.d., p. 2). Writers should proofread their documents and look for:

- too-long sentences (n.d., p. 2);
- passive voice (n.d., p. 2);
- "long strings of nouns and adjectives" (n.d., p. 2);
- "unnecessary, repetitious, and irrelevant words" (n.d., p. 2);
- duplication (n.d., p. 2);
- over-emphasis (n.d., p. 2);
- self-evident statements (n.d., p. 2); and
- circumlocution (n.d., p. 2).

Sasse advocates writers check to ensure their document is as concise as possible, uses active voice where appropriate, and omits unnecessary words (2000, p. 4). Strunk's Rule 13 is "Omit needless words":

"Vigorous writing is concise. A sentence should contain no unnecessary words, a paragraph no unnecessary sentences, for the same reason that a drawing should have no unnecessary lines and a machine no unnecessary parts. This requires not that the writer make all his sentences short, or that he avoid all detail and treat his subjects only in outline, but that every word tell" (1999, Rule 13 section, para. 1).

NACAC provides a list of some unnecessary words, which include: "Maybe, Possibly, In some way, Somewhat, Generally, Usually, Mostly, More fully.... Very, finally, Essentially, Simply put, Really, Totally, Especially, More than ever, Quite, Rather, Particularly, Substantially. These are fillers. They can be cut, but if you still want emphasis, try changing your verb" (NACAC, n.d., pp. 3-4).

Beyond the above discussion of brevity, Beckno devotes much time to the subject of wordiness. He identifies a number of common writing errors and explains how to fix them.

The first error is pompous diction, where authors write to impress rather than express, with "big words and pompous phrases" (n.d., p. 11-7). Instead of this, Beckno promotes using the clearer, much shorter counterparts to the pompous phrases; for example, instead of "consideration be given to", writers should say "consider" (n.d., p. 11-7).

Overuse of *the*, *that*, or *which* is a second error, and Beckno states writers should use these words only to clarify meaning (n.d., p. 11-7). For example,

- "The regulations won't allow it" (Beckno, n.d., p. 11-7);
- "I feel that it's a good decision" (Beckno, n.d., p. 11-7); and
- "The report which I'm writing is nearly finished" (Beckno, n.d., p. 11-7).

Another error is dummy subjects, "empty expressions that obscure the real subject... make the sentence longer...delay the point...encourage passive voice, and...hide responsibility" (Beckno, n.d., p. 11-8). Some examples include sentence openers like "It is", "It appears", "There is (are)", and "It will be" (Beckno, n.d., p. 11-8).

Redundant pairs create "meaningless or unnecessary distinctions that add bulk but not information", and occur when writers put together two ideas that are slightly different (Beckno, n.d., p. 11-8). For example,

- "The manager's function and role . . ." (Beckno, n.d., p. 11-8);
- "The diplomats engaged in a frank and candid dialogue" (Beckno, n.d., p. 11-8); and
- "First and foremost, we must focus on priorities" (Beckno, n.d., p. 11-8).

In this case, writers should "eliminate one [of the words] and retain the one that expresses meaning more precisely" (Beckno, n.d., p. 11-8).

Similar to redundant pairs, redundant modifiers are words that unnecessarily modify other words, like:

- "Basic fundamentals" (Beckno, n.d., p. 11-8);
- "Actual facts" (Beckno, n.d., p. 11-8);
- "End result" (Beckno, n.d., p. 11-8);
- "Separate out" (Beckno, n.d., p. 11-8);
- "Narrow down" (Beckno, n.d., p. 11-8);
- "Seldom or ever" (Beckno, n.d., p. 11-8).

Needless repetition, as the name implies, needlessly repeats "words or phrases...creates redundancy and makes writing appear juvenile" (Beckno, n.d., p. 11-9).

Another error Beckno identifies is compound nouns. Going against the theory of brevity in favor of clarity, writers may sometimes need to add extra words to make their sentence easier to read, such as with "long strings of nouns as modifiers" (Beckno, n.d., p. 11-9). For example, instead of

"Increased high cost area allowances",

it is clearer to write

"Increased allowances for high cost areas" (Beckno, n.d., p. 11-9).

Smothered verbs, the last of Beckno's wordiness errors, are ones that the writer converted to nouns and buried in the text (n.d., p. 11-10) rather than putting them clearly up front. This practice "lengthens a sentence and saps its vitality" and encourages passive voice (Beckno, n.d., p. 11-10).

Beckno's example shows this effect, where, rather than writing

"We agree with the decision"

the author writes

"We are in agreement with the decision" (n.d., p. 11-10).

Here, "the writer has smothered the main verb (*agree*) with a noun (*agreement*). The noun now requires a helping verb (*are*) and a preposition (*in*) to show action" (Beckno, n.d., p. 11-10).

### **Academia, Science And Experts:**

Marshal McLuhan, in his classic 1968 book *The Medium Is The Massage*, <sup>11</sup> discusses the bombardment of information that society faces with the advent of electric circuitry (e.g. television, and now the Internet):

"Information pours upon us, instantaneously and continuously. As soon as information is acquired, it is very rapidly replaced by still newer information. Our electrically-configured world has forced us to move from the habit of data classification to the mode of pattern recognition. We can no longer build serially, block-by-block, step-by-step, because instant communication insures that all factors of the environment and of experience co-exist in a state of active interplay" (Agel, Fiore & McLuhan, 2001, p. 60).

As more and more information "pours" in, it is increasingly important that authors convey each piece of information in the most succinct, to-the-point manner available. In short, brevity is an increasingly valuable trait.

Herb Shapiro, Professor and Writing Program Director at Empire State College in New York, stresses brevity and recommends that writers use necessary words only (Shapiro, n.d., para. 4), and employ short sentences (Shapiro, n.d., para. 1) and paragraphs, ensuring there is only one idea per paragraph (Shapiro, n.d., para. 2).

Teresa O'Sullivan, PharmD, a lecturer at University of Washington's Department of Pharmacy, states that in technical writing, "conciseness [is] encouraged and valued" (n.d., Technical writing section, p. 1). She explains that some general rules for word choice are to "Use short words in short sentences, particularly at first" (n.d., General rules for word choice section, p. 1) and to "Avoid using long words when shorter words will do" (n.d., General rules for word choice section, p. 1). For example, instead of writing

<sup>&</sup>lt;sup>11</sup> While most people believe the book is called *The Medium Is The MESSAGE*, it is actually *The Medium Is The MASSAGE*, in reference to McLuhan's writing: "All media work us over completely. They are so pervasive in their personal, political, economic, aesthetic, psychological, moral, ethical, and social consequences that they leave no part of us untouched, unaffected, unaltered. The medium is the massage. Any understanding of social and cultural change is impossible without a knowledge of the way media work as environments" (Agel, Fiore & McLuhan, 2001, p. 26).

"A complete pharmacokinetic study prevented the investigators from missing any important perturbations, which could have been due to any of the following: poor absorption of oral doses or lack of conversion of prednisone to prednisolone" (n.d., General rules for word choice section, p. 1),

a better, *clearer* explanation follows:

"A complete pharmacokinetic study allowed the investigators to rule out confounding factors. They tested the rate and extent of prednisone absorption. They also examined prednisone to prednisolone conversion. Differences in absorption or conversion could otherwise have accounted for the differences in clearance between the groups" (n.d., General rules for word choice section, p. 1).

"In today's world, recruiters and hiring managers want/need bullets, quick access to information and experience, not drawn out sentences to describe job responsibilities", according to one of the recruiters ResumeDoctor interviewed for their survey (Worthington, n.d., #8 - Long Paragraphs section, para. 1). The idea that recruiters "want a résumé's details to be short, concise and to the point" (Worthington, n.d., #8 - Long Paragraphs section, para. 1) founded pet peeve number eight – "long paragraphs".

As resumes have only about ten seconds of a recruiter's time before being discarded, job seekers must use brevity when conveying their message.

A 2003 evidence-based study by the National Cancer Institute (NCI) on web usability and design guidelines (NCI, 2003, What's the purpose of this site? section, para. 1) recommends writing "sentences with 20 or fewer words and paragraphs with fewer than five sentences.... Readability improves when sentences and paragraphs are relatively short. Users tend to skip over text they consider nonessential" (NCI, 2003, Use Short Sentence/Paragraph Lengths section, paras. 1-2).

Morkes and Nielsen also found that web readers want a document "to make its points quickly" (1997, Text Should be Concise section, para. 2). One of their study participants said of a movie review: "There's a lot of text in here. They should get more to the point. Did they like it or didn't they?" (Morkes & Nielsen, 1997, Text Should be Concise section, para. 2). The study noted that readers found answers to their questions significantly faster if information on the website was concise (Morkes & Nielsen, 1997, Study 3 Results section, para. 1). Moreover, one of the three main conclusions observed that users "prefer the text to be short and to the point…[and] do not like long, scrolling pages" (Morkes & Nielsen, 1997, Introduction section, para. 4).

Participants using concise website also made fewer errors, had significantly better recall and had significantly higher subjective satisfaction than the Control group, whose website was long and drawn out (Morkes & Nielsen, 1997, Study 3 Results section,

paras. 2, 3 and 7). Further, data from Steve Outing and Laura Ruel's Eyetrack study "revealed that stories with short paragraphs received twice as many overall eye fixations as those with longer paragraphs" (n.d., What about article layout, writing style? section, para. 3).

Source Reliability: 9/10

### Conclusion:

Both academic professionals and scientific studies concur that brevity is a highly important writing trait, therein supporting the style manuals' assertions. "Concise" does not simply mean "short in length" however; concision calls for efficient writing, that is, densely packed – but readable – sentences and paragraphs. In the 'Concision' maxim, thirteen – busy – decisionmakers demand brevity from their analysts. This is also an explicit part of 'Packaging', and implicit in 'Clarity', as short words – and documents – are simpler and easier to understand.

**Analytic Confidence: 10/10** 

ule #8: Be concise. (Strength: 9.5/10)

### Clarity According To...

### Style Manuals:

The style manuals presented a number of fundamental ideas relating to clarity:

- writing should be clear (Beckno, n.d., p. 11-3; NACAC, n.d., p. 1; Sasse, 2000, p. 4);
- meanings should be precise, not vague (Sasse, p. 4);
- no jargon (Beckno, n.d., p. 11-4; CIA, 1999, p. 105; NACAC, n.d., p. 1; Sasse, 2000, p. 31; USAMC, 2003, p. D-2);
- avoid clichés, slang or figures of speech (CIA, 1999, p. 57; NACAC, n.d., p. 2; USAMC, 2003, p. D-2);
- make sure the reader can clearly comprehend the "who, what, when, where, why, and how", as well as all other relevant information (NACAC, n.d., p.2; Sasse, 2000, p. 4);

- writing should be simple (Sasse, 2000, p. 31; USAMC, 2003, p. D-2);
- the writer should explain ideas concretely, support assertions completely, and present analysis clearly, with distinct organizing ideas (Sasse, 2000, p. 4); and
- the document should include the right amount of detail (Sasse, 2000, p. 4).

Sasse explains that precluding confusion and ensuring effective communication is one facet of the importance of clear writing: "Although the writer knows what is meant by her writing, it only takes a few ambiguities...to confuse the reader and render the document ineffective. Lack of precision reveals to the reader fuzzy thinking" (2000, p. 31).

Beckno further elaborates that unclear writing wastes time on the part of both reader and writer. If readers cannot readily understand a document from the start, they will waste time rereading, guessing, finding a dictionary, or picking up the phone (Beckno, n.d., p. 11-3). The writer then wastes time "taking calls from confused readers...writing a clarification message, or...explaining to an irate boss why the paper must be rewritten" (Beckno, n.d., p. 11-3).

"In today's world of time constraints and information overload, readers don't have time to wade through obscure writing, searching for meaning. If you write well, readers will read what you write, quickly understand it, and remember who wrote it (Beckno, n.d., p. 11-1).... Action officers must write well; they write documents for senior leaders to sign, often widely read, and having large impact. One who writes with a golden pen has an edge. An otherwise talented person who doesn't write well works at a disadvantage. This gifted writer says it best:

Bad writing makes bright people look dumb. —William Zinsser" (Beckno, n.d., p. 11-3).

### Academia, Science And Experts:

Herb Shapiro, Professor and Writing Program Director at Empire State College in New York, notes writers should use simple words, avoiding jargon (Shapiro, n.d., para. 5) and clichés (Shapiro, n.d., para. 7), but should feel free to include anecdotes and quotations (Shapiro, n.d., para. 10). Further, "Do not use a foreign term when there is an adequate English *quid pro quo*" (Shapiro, n.d., para. 13).

Morkes and Nielsen's study indicates that readers prefer simple and "down-to-earth" writing, so that, as one participant remarked, "just anybody could read it and understand" (1997, Simple and Informal Writing are Preferred section, para. 1).

Teresa O'Sullivan, PharmD, a lecturer at University of Washington's Department of Pharmacy, stresses clarity and professionalism in technical writing. Writers should "Use familiar words, but avoid colloquialism", that is, writing "the same way you speak...conversationally" (n.d., General rules for word choice section, p. 1). Additionally, O'Sullivan recommends not using metaphors; writers should instead "stick to the facts" (n.d., General rules for word choice section, p. 1).

When writing for the dyslexic audience, Blankfield, Davey and Sackville, whose research created a set of guidelines for tutors to follow to make online courses more accessible to dyslexic students, advocate clarity. "Make information explicit – especially the learning outcomes, assessment criteria, and online expectations. Don't let this information get lost amongst other material" (Blankfield et al., 2002, Tutoring section, p. 9). Peter Rainger, Visiting Fellow at University of Sussex in the United Kingdom, further comments, "Authors should try to write in a clear, consistent and concise manner" (Rainger, 2003, Making content readable for those with dyslexia section, p. 9).

Source Reliability: 8/10

### Conclusion:

Based on academic and scientific evidence, style manuals justifiably encourage clarity. Writers should employ simple words and avoid jargon to convey their message clearly. Decisionmakers – twenty-one of them – further reinforce this point, requiring clear, straightforward words from their analysts. 'Clarity' is one of the most important maxims for analysts to adhere strictly to as it has such a large impact on intelligence documents; that is, it makes the difference between the decisionmaker comprehending the content – or not. It is also implicit in 'Accountability' and 'Packaging'.

**Analytic Confidence: 9/10** 

ule #9: Write clearly, using simple words, and avoiding jargon.

(Strength: 8.5/10)

**Consistency According To...** 

Style Manuals:

NACAC, Sasse and the USAMC suggested writers be consistent in their documents. NACAC mentions consistency regarding verb tenses: "Consistency, consistency, consistency, match your topic. If you did a research project, don't say 'I find in my results' after saying 'We fertilized each plant differently.' Stick to...whatever tense applies" (n.d., p. 5). Sasse's "Checklist of Substance Issues" includes the question: "Is the document consistent throughout" (2000, p. 4)? And the USAMC advocates that writers be "consistent in each document with the style of date you use" (2003, para. 14).

### **Academia, Science And Experts:**

In Lessons from Pavlov's Salivating Dogs, O. Alex Mandossian, one of the world's top Guerilla Marketers, Managing Director of Heritage House Publishing, Inc. and Chief Marketing Officer for Robell Research, Inc, writes, "The first key to writing persuasive Web copy is the principle of consistency" (Mandossian, 2003, p. 2). The third principle is that of anchoring, where he discourages writers from creating new words or using big words, and instead suggests they use words that are already there in the document (Mandossian, 2003, p. 2).

Herb Shapiro, Professor and Writing Program Director at Empire State College in New York, advocates consistent tenses: "When you change tenses, have a reason. Don't be afraid of the present tense" (Shapiro, n.d., para. 6).

Ruth Anne Robbins, of Rutgers School of Law, promotes "uniformity throughout the document's overall design", such as with heading formats, spacing and chunking styles (2004, p. 131). She asserts that readers "crave consistency because it helps organize the information and unify the hierarchy" (Robbins, 2004, p. 131).

The National Cancer Institute's (NCI) study on web usability and design guidelines found that being consistent, that is, presenting information such as titles, headers, positioning of recurring text and logos consistently throughout sites (NCI, 2003, Be Consistent section, para. 1), makers it easier for users to "quickly evaluate categories and match expectations on all pages" (NCI, 2003, Be Consistent section, para. 2).

Source Reliability: 9.2/10

### Conclusion:

Style manuals are correct in recommending consistency, both in a document's layout and within the content. Decisionmakers also wanted 'Consistency' from their analysts, specifically regarding the latter's use of a standardized terminology. Explicit in the 'Packaging' maxim is also a desire for consistent layout and writing style to ensure user-friendliness.

**Analytic Confidence: 8/10** 



(Strength: 8.6/10)

## **Tailoring Content And Style According To...**

Reasonable men adapt themselves to the world.
Unreasonable men adapt the world to themselves.
That's why all progress depends on unreasonable men.

George Bernard Shaw

### Style Manuals:

Three style manuals recognized the importance of tailoring content and writing style for the reader. Before contributors write their papers for submission, NACAC advises them to choose subject matter that would appeal to the counselors and admission officers who will be reading the paper (n.d., p. 1), and to keep "your readers in mind, not your scholarly peers" when writing (n.d., p. 2).

USAMC advises its staff not to use jargon with which the reader will be unfamiliar. "Never use military dates in nonmilitary correspondence, and vice versa" (2003, p. D-4). Additionally, in discussion papers, writers should analyze the target audience (USAMC, 2003, p. H-5), determine the background the recipient needs (USAMC, 2003, p. H-5), and tailor the paper for the user (USAMC, 2003, p. H-5).

Sasse asks readers to ensure that papers are reader-centered, focused and address their specific issues and problems (2000, p. 4). He advises: "Get into the head of the readers and think how they will read your message. Be sure to treat your audience as a consumer or better yet your customer" (2000, p. 8).

### Academia, Science And Experts:

The basic premise behind neurolinguistic programming (NLP), a 'technology' that teaches skills for communication excellence, is that "people like people who are like themselves" (Brooks, 1989, p. 19). Essentially, individuals form unconscious – and instant – relationships with people who are similar to them or who act or do things similar to the way they themselves act or do. For example, someone who habitually employs Times New Roman, size 12 font instantly feels a (possibly wholly

unconscious) bond when faced with a document in that same typeface. Conversely, upon encountering the same paper, but now written in *Monotype Corsíva*, *síze* 12, they are less likely to want to read it. It is not "their style". According to Michael Brooks, NLP trainer and author of *Instant Rapport*, "Because of the way we're put together, we gravitate to people who like the things we like and behave the way we do" (1989, p. 19). With this in mind, it makes sense that writers should tailor their document's content and style according to what their audience demands and desires. By doing so, we "create rapport with them by being like them" (Brooks, 1989, p. 20).

In 29 Success Secrets That Help You Create And Sell Winning Info Products...Even While You Sleep!, O. Alex Mandossian, who has studied extensively marketing principles of the past two centuries, writes as the number one secret:

"Always know your target audience before you begin to develop your information products" (Fundamentals, 2003, p. 2).

In his bestselling book *Selling the Invisible*, Harry Beckwith, nationally known for his marketing expertise and founder of positioning and branding firm Beckwith Partners, describes the pitfall of the salesperson who fails to tailor their pitch to what the potential customer needs to hear. He observes that the customer is busy and has little attention to give, and so the salesperson must "Give them powerful reasons to listen to you, or they will give you only ear service" (Sasse, 2000, p. 8).

"Many service marketers know this, but few act on it. Instead of talking about the prospect and what she needs, these marketers talk about their company. Instead of showing what they will do for a prospect, they strive to show how good their company is. Instead of speaking the prospect's language, they speak their own.

"The prospect is thinking, 'Me, me, me.' Unfortunately, the marketer is thinking that, too. The two fail to connect" (Sasse, 2000, p. 8).

Source Reliability: 10/10

#### Conclusion:

Style manuals correctly advise writers to tailor their products to the reader. Two things are apparent. First, readers immediately prefer papers presented according to their unique 'style'. Second, readers are less likely to devote time and attention to papers that are irrelevant to them. The idea of 'Decisionmaker-focused' intelligence is the strongest maxim that decisionmakers support; they consistently demanded customized products from their analysts and expressed an aversion to documents that analysts did not tailor. This is the single most important rule for intelligence analysts to abide

**by.** It is also implicit in 'Accuracy', as content that plainly meets the decisionmakers' needs is "accurate" according to what they want, and explicit in 'Packaging', since a tailored product is inherently user-friendly.

**Analytic Confidence: 9.5/10** 

ule #11: Tailor content and style to the reader. (Strength: 9.75/10)

# Academia, Science And Experts On: Form

Essentially all formatting features mentioned in style manuals work towards two purposes: to make a document more readable and more accessible to the user. The features break into the four categories of:

- accessibility/organization;
- font:
- graphics; and
- spacing.<sup>12</sup>

Organization seeks to make documents more user-friendly by including "scannable" features such as headings, subheadings, bullets, a logical flow and structure, and main points that are distinct from the rest of the text. Under font come issues such as font type (e.g. Times New Roman vs. Arial), font size (e.g. 12-point), and font style (e.g. all caps, bold or italics). Graphics concerns the proper use of pictures, charts, tables, graphs, and any possible type of graphic. Lastly, spacing techniques involve manipulating the document's white space, for example, by adjusting line length, line spacing and margins.

# **Accessibility**

The four sub-topics under accessibility are: organization (or accessibility), heading hierarchy, headlines and subject lines, and tailored format.

# Accessibility/Organization According To...

### Style Manuals:

Six of the style manuals discussed a document's accessibility or organization as an important factor to consider. Engineering and science students utilize formats that help "emphasize the important information...[and allow] readers to find key information" (Alley, Crowley, Donnell, & Moore, 2004, para. 3), while authors submitting papers to the National Association for College Admission Counseling (NACAC) structure their papers to include subheads and check to ensure the content is well organized (n.d., p. 2). Alley et al. also recommend writers brand their product – through typeface, layout or color, for example – to differentiate it from others and help readers identify the author (2004, para. 4).

The United States Army Materiel Command (USAMC) orders its staff to package content "logically to facilitate review" (USAMC, 2003, p. D-2), to "[h]ighlight the

<sup>&</sup>lt;sup>12</sup> All sub-categories within each of these four categories are ordered alphabetically.

details in the enclosure with tabs, flags, etc., so that if the reader requires more detail, he or she can find it easily" (USAMC, 2003, p. D-2), to avoid complex paragraphs, and notes that "points should 'jump off the paper" (USAMC, 2003, p. H-5).

Sasse provides a checklist of substance issues for writers to follow, and asks to ensure that they:

- structure the document in a logical, reader-friendly order (Sasse, 2000, p. 5);
- write in a manner that is "logical, easy to follow, and clear" (Sasse, 2000, p. 5); and
- give the document a "neat and professional appearance that is reader-friendly" (Sasse, 2000, p. 5).

"The goal is to make the information as readable as possible" and writers can optimize the document's structural integrity by ordering it logically (Sasse, 2000, p. 15) and "by providing explicit cues to the overall direction and pattern of the document" (Sasse, 2000, p. 15). Employing subheadings is a common way to indicate easily the document's sections or main ideas (Sasse, 2000, p. 15). "As documents increase in length, structure becomes a more essential tool for the writer" (Sasse, 2000, p. 14).

Beckno, on behalf of the US Army Training and Doctrine Command, also teaches Action Officers (AOs) about packaging, explaining that for a reader to understand quickly a document's content, the author must organize the writing in a logical and coherent fashion (Beckno, n.d., p. 11-4). Further, "readers are more likely to read something when" the author has packaged it attractively to enhance readability and visual appeal, as good packaging makes a document easier to read (Beckno, n.d., p. 11-13). To improve visual appeal, Beckno advocates mimicking the media's use of visual devices such as bulleted lists – especially if a "sentence contains a series of related ideas or laundry-list items" (n.d., p. 11-15), bold headings, color, graphics and charts, text boxes, and different text formatting like italicized font (n.d., p. 11-13).

The CIA also advocates using bullets, so long as there are "at least two" (1999, p. 15).

### Academia, Science And Experts:

The Effective Reading course available through Progressive Training, a global business development and training firm, teaches its participants the following strategies that effective readers employ: first, these readers scan the title for key words of interest; then, if the title is enticing, they do a quick skim of the document; and finally, they look for the bottom line, review headings and sub-headings, and look for an executive summary (Bruner Business Communication, 2003, paras. 2-5).

"[R]eaders can only use these strategies on clearly structured, well-written documents" (Bruner, 2003, para. 6), however, and organizational techniques will help readers effectively read. Bruner Business Communication, who trains businesses to communicate effectively, recommends that writers:

- make the title meaningful (Bruner, 2003, para. 9);
- put the bottom line up front (Bruner, 2003, para. 7);
- write "an executive summary that satisfies your reader's need to know the gist and key facts of your document" (Bruner, 2003, para. 8);
- use "information-rich headings and sub-headings throughout" (Bruner, 2003, para. 12); and
- ensure "each paragraph or section starts with a topic sentence" (Bruner, 2003, para. 13).

Thompson, Johnstone and Thurlow explored principles of universal design – a concept that seeks to make a single structure accessible and applicable to the widest number of people – to create a set of criteria from which educational facilities can design assessments that "meet the needs of the widest range of students possible" (2002, Executive Summary section, para. 10). Two of the seven principles of universal design concern a document's accessibility and proper organization.

Principle Three, Simple and Intuitive Use, promotes designs that are easy for users to understand, that eliminate unnecessary complexities, are "consistent with user expectations and intuition", and arrange information "consistent with its importance" (Thompson et al., 2002, Principles of Universal Design section, para. 3).

According to Principle Four, Perceptible Information, the design "communicates necessary information effectively to the user" using different modes – graphical, auditory or tactile – "for redundant presentation of essential information" (Thompson et al., 2002, Principles of Universal Design section, para. 4). Designs should also maximize "'legibility' of essential information" and provide "adequate contrast between essential information and its surroundings" (Thompson et al., 2002, Principles of Universal Design section, para. 4).

The National Cancer Institute's (NCI) 2003 evidence-based study on web usability and design guidelines (NCI, 2003, What's the purpose of this site? section, para. 1) recommends reducing users' workload (NCI, 2003, Reduce Users' Workload section, para. 1). One way to do this is to "Use lists to break up long sentences" (NCI, 2003, Use Short Sentence/Paragraph Lengths section, para. 1).

Another way is to "Enhance scanning by providing clear links, headings, short phrases and sentences, and short paragraphs" (NCI, 2003, Enhance Scanning section, para. 1). NCI explains,

"Users tend to scan, stopping only when they find something interesting. Research shows that users have difficulty finding a specific piece of information when the page contains wall-to-wall text. Users struggle to find alternatives to reading. They resort to a modified scan strategy and usually read the first sentence and/or scan for links on the page" (NCI, 2003, Enhance Scanning section, para. 2).

Offering tips to make White Papers succeed, Klariti Writing Services, who provide writing services across Ireland and the European Union (EU), advocate organizing a document's content in such a way as to set up the discussion and maintain the reader's attention:

"Before you get into the heart of your paper, provide the relevant background material to support your arguments. Explain in the opening section why your solution exists and the specific problem(s) that it solves (Klariti, n.d., Subject Matter Organization section, para. 1).

"White papers that meander from topic to topic lose the reader. Each paragraph should only discuss one idea. Don't mix ideas in the same sentence or paragraph" (Klariti, n.d., Subject Matter Organization section, para. 2).

Miguel A. Cortes, a graduate student at San Diego State University, strongly advocates scannability as the main factor behind website design, as people read twenty-five percent slower online than they do on paper (Cortes, n.d., Information Design section, para. 1). "Therefore, the amount of text and how it is presented are important considerations when designing web pages" (Cortes, n.d., Information Design section, para. 1). Additionally, in one study, seventy-nine percent of participants always scanned new pages (Cortes, n.d., Information Design section, para. 1).

To encourage scannability, Cortes notes that chunking – or grouping – content into small paragraphs effectively organizes information, and labeling these chunks with headings "helps users forecast what the chunk of text will focus on" (Cortes, n.d., Textual section, para. 1).

Chunking a document's content is helpful also for dyslexics, as Blankfield, Davey and Sackville discovered in their research that created a set of guidelines for tutors to follow to make online courses more accessible to dyslexic students. "Content needed splitting into appropriate 'chunks'. If there was too much text in one paragraph, or on one page/screen, it could be too 'intense'" (Blankfield et al., 2002, Organisation of content section, p. 5). Additionally, "Major elements of the...content needed to be made obvious" (Blankfield et al., 2002, Organisation of content section, p. 5).

Peter Rainger, Visiting Fellow at University of Sussex in the United Kingdom, supports this view on writing for dyslexics and states, "Avoid dense blocks of text by using short paragraphs" (Rainger, 2003, Keep to left aligned, un-justified text section, p. 7) and, where appropriate, "use bullets or numbers rather than continuous prose" (Rainger, 2003, Keep to left aligned, un-justified text section, p. 7).

The data that ResumeDoctor compiled regarding recruiters and headhunters' top twenty resume pet peeves landed "long paragraphs" at number eight. Aside from a desire for brevity, recruiters also want resumes presented in an accessible format that is "easy for the reader to 'scan'" (Worthington, n.d., #8 - Long Paragraphs section, para. 3) and employs "blunt, paraphrased bullet-points" and "appropriate amounts of 'white space' to help guide" the reader (Worthington, n.d., #8 - Long Paragraphs section, para. 4).

"Think of a resume as 'ad copy.' Take a look at the Sunday circulars in the paper. Notice how the ad copy is easy to read and is spread out using key bullet-points to emphasize the criteria consumers are using to make a buying decision. For example, cubic feet of storage space, ice maker, water dispenser, color, side by side doors, price etc" (Worthington, n.d., #8 - Long Paragraphs section, para. 5).

Highly-organized web content, where important information is easy to find, is best, according to studies by Dr. John Morkes and Jakob Nielsen, PhD., as "users are under emotional and time constraints" (1997, Users Want to Get Their Information Quickly section, para. 1). A website that was "scannable", concise and objective was 124 percent better than a Control website featuring long paragraphs with no distinct headings (Morkes & Nielsen, 1997, Study 3 Results section, para. 9). Fifteen of the study's eighteen participants "always approached unfamiliar Web text by trying to scan it before reading it", and got frustrated when the text was not, in fact, "scannable" (Morkes & Nielsen, 1997, Text Should be Scannable section, para. 1).

The third, measured, study by Morkes and Nielsen found that users of a scannable version of a travel website "performed tasks significantly faster than users of the control version", whose long paragraphs were not broken up at all (1997, Study 3 Results section, para. 1). Scannable website users also made significantly fewer errors, had better memory recall and had significantly higher subjective satisfaction than the Control group (Morkes & Nielsen, 1997, Study 3 Results section, paras. 2, 3 and 7).

Steve Outing and Laura Ruel's eye-tracking study, which monitored readers' eye movements as they looked through mock news websites, found that peoples' eyes tend to focus first on "the upper left of the page, then hovered in that area before going left to right" (n.d., At the core: Homepage layout section, para. 1). Also, "Dominant headlines most often draw the eye first upon entering the page -- especially when they are in the upper left, and most often (but not always) when in the upper right" (Outing & Ruel,

n.d., At the core: Homepage layout section, para. 3). Pictures and graphics, then, do not catch the eye's attention first.

"[T]he form should fall into the background rather than be part of a problem in understanding", according to Richard Wanderman, educational consultant on learning disabilities and founder of LD Resources (n.d., Choosing Reading Materials section, para. 1). "All print materials are not equal: some are designed well and highly readable, others are designed poorly and are less readable. All textbooks, pamphlets, workbooks, handouts, and other print materials that we give people to read should be easy to read" (Wanderman, n.d., Choosing Reading Materials section, para. 1).

Source Reliability: 8.2/10

### Conclusion:

Academia and science fully support the style manuals' call for highly organized, user-friendly, accessible and scannable documents. Writers should break up text for easy readability using headings, large font, bold or highlighted text, bullets, and/or graphics with captions. Decisionmakers also call for accessible documents in the 'Packaging' maxim, desiring attractive, user-friendly packaging. Part of making documents accessible and user-friendly requires putting the 'Bottom Line Up Front', another maxim.

Analytic Confidence: 10/10

ule #12: Make documents scannable, accessible and user-friendly.

(Strength: 9.1/10)

## **Heading Hierarchy According To...**

### Style Manuals:

In order for readers to "understand what information in the document is primary and what...is subordinate", Alley et al. recommend writers use heading hierarchies (2004, para 5). There are four common ways to achieve this hierarchy:

- "by type size (18 points, 14 points, 12 points)" (Alley et al., 2004, para. 6);
- "by white space (3 spaces, 2 spaces, 1 space)" (Alley et al., 2004, para. 6);

- "by type style (boldface, boldface italics, italics)" (Alley et al., 2004, para. 6); and
- "by number (2.0, 2.0.1, 2.0.1.1)" (Alley et al., 2004, para. 6).

Sasse suggests writers leave "more space above a heading than below it" and to use "white space to give distinction to headings" (2000, p. 38). Employing multiple heading styles, such as bold and underlined headings, is typically unnecessary (Sasse, 2000, p. 38). Strunk also notes writers should "Leave a blank line, or its equivalent in space, after the title or heading of a manuscript" (1999, A Few Matters of Form section, para. 1).

### Academia, Science And Experts:

Richard Wanderman, educational consultant on learning disabilities and founder of LD Resources, states:

"Headlines or headings can be made bigger than body type to show a hierarchy of importance and to give the eye something easier to scan when moving through a series of ideas. One wouldn't want to read nine point type for long periods and making a line 36 point text would limit the number of words on a line such that reading quickly for meaning would be impaired. There's a middle ground somewhere between twelve and 18 point for most situations" (Wanderman, n.d., Size section, para. 1).

Ruth Anne Robbins, Clinical Associate Professor of Law at Rutgers School of Law, Camden, asserts that headings help readers "search effectively for answers to questions about the text" and "provide the super-structure of the document", leading to better concept recall (Robbins, 2004, Headings Chunk The Information section, p. 125).

This is especially true if the information is "chunked". Chunking information under headings, as cognitive psychologists purport, aids memory and increases the likelihood that readers will be able to recall the information:

"Research concludes that human short-term memory can process seven plus or minus two...chunks at a time without losing information. Chunking information can help increase the likelihood of retaining the information in the working memory. Without it, the reader is overloaded and may completely stop processing the information" (Robbins, 2004, Headings Chunk The Information section, p. 125).

Writers must organize chunks according to some sort of hierarchy, however, "such as in sequence or by category" (Robbins, 2004, Headings Chunk The Information section, p. 125). "Headings help create those chunks for the reader, thus improving the likelihood

of the reader recalling the information" (Robbins, 2004, Headings Chunk The Information section, p. 126).

Source Reliability: 8.3/10

Conclusion:

Academia and science support the style manuals' assertions that writers should organize headings in a hierarchy. Other than Wanderman's advice to increase font size, the former does not provide details as to how to do this. An analyst organizing headings according to a hierarchy satisfies the decisionmakers' maxims for user-friendly 'Packaging' and a 'Bottom Line Up Front'.

**Analytic Confidence: 8/10** 

ule #13: Use a hierarchical heading structure. (Strength: 8.15/10)

# Headlines/Subject Lines According To...

### Style Manuals:

Both NACAC and the USAMC addressed the issue of effective use of titles and headlines. NACAC states, "The article's title should be short, descriptive and interesting", and writers should structure documents to include subheads (n.d., p. 2). USAMC advises writers to "Keep the subject line concise and succinct" (2003, p. E-2).

### Academia, Science And Experts:

O. Alex Mandossian, a top Guerilla Marketer, Managing Director of Heritage House Publishing, Inc. and Chief Marketing Officer for Robell Research, Inc, emphasizes the importance of effective headlines in copywriting. He provides a powerful and famous example to demonstrate how one sentence can entice a reader to read more: "New Jersey Man Sells Brooklyn Bridge For \$14.95" (2003, p. 4). Mandossian also recognizes the strength of headlines that speak solely to a target audience. The following two headlines, which appealed to men, were split-tested in *Popular Science* magazine:

1. "How To Build An Attic Room"; and

## 2. "How To Build Your Own Darkroom" (Mandossian, 2003, p. 7).

Headline number one provoked a significantly greater response with 312 percent more coupons mailed in (Mandossian, 2003, p. 7). While both headlines advertised "how to build a room", the wording in headline number two only appealed to men heavily interested in photography and excluded all others.

A 2003 evidence-based study by the National Cancer Institute (NCI) on web usability and design guidelines (NCI, 2003, What's the purpose of this site? section, para. 1) states that when designing the layout, authors should "Use many, carefully selected headings, with names that conceptually relate to the information or functions they describe" (NCI, 2003, Use Well-Designed Headings section, para. 1).

Headings "provide strong cues that orient viewers and inform them about a page's organization and structure...help classify information on a page...[and] are an important tool for helping users scan text" (NCI, 2003, Use Well-Designed Headings section, para. 2). Writers should construct "headings and page titles that clearly explain what the page is about and that will make sense when read out-of-context" (NCI, 2003, Use Well-Designed Headings section, para. 2).

The first couple of words of a title or subject line must be catchy and engaging, as Steve Outing and Laura Ruel's Eyetrack study confirmed. The study found that when people scanned down a list of news headlines on a website – which can be compared with a Table of Contents or an Inbox – most people looked at the left side of the headlines, and were only likely to read the full headline "[i]f the first words engaged them.... On average, a headline has less than a second of a site visitor's attention" (Outing & Ruel, n.d., Partial viewing of headlines, blurbs found to be common section, para. 1).

While readers tended only to scan the text when there was a larger font, picking out key words or phrases (Outing & Ruel, n.d., Want people to read, not scan? Consider small type section, para. 1), writers are able to draw in their audience by adjusting the headline's font size, however. The Eyetrack study found that a smaller font caused people to read more words and to focus more on the meaning of the words (Outing & Ruel, n.d., Want people to read, not scan? Consider small type section, para. 1).

ResumeDoctor's pet peeve number thirteen advises job seekers to include a headline, "one powerful sentence or phrase" that grabs the reader, in place of a meaningless "Objective" line (Worthington, n.d., # 13 Objectives or Meaningless Introductions section, para. 2). "Think of this like a headline to a major front-page news story ... PATS UPSET RAMS IN SUPERBOWL. What is going to grab that reader to want to read further?" (Worthington, n.d., # 13 Objectives or Meaningless Introductions section, para. 2). An example "headline" is:

"Senior-Level Health and Safety Manager with Extensive Experience Working with FDA Regulations in the Pharmaceutical Manufacturing Arena" (Worthington, n.d., # 13 Objectives or Meaningless Introductions section, para. 3).

Source Reliability: 10/10

### Conclusion:

Style manuals, while they correctly judging the importance of descriptive headlines and titles, need to put significantly more emphasis on urging writers to create bold, enticing, grabbing headlines. The maxims for 'Packaging' and 'Bottom Line Up Front' demand meaningful headlines as these provide both a user-friendly structure and a one-line snapshot of the analyst's bottom line.

Analytic Confidence: 10/10

ule #14: Use powerful, meaningful and enticing headlines.

(Strength: 10/10)

# Tailored Format According To...

### Style Manuals:

NACAC and Sasse advocate tailoring format to match individual projects. NACAC asserts that the scope of the topic covered should determine the document's length (n.d., p. 2), and Sasse reminds writers to ensure they present their paper in the correct format (e.g. letter, memo, report) and include all appropriate parts (e.g. table of contents, executive summary) (2000, p. 5).

### Academia, Science And Experts:

The medium, or the format, in which authors deliver their message is just as important as the content within. Moreover, with any medium come restrictions, most often in the form of length limitations. In today's fast-paced world, where brevity is a major indicator of whether readers will peruse or simply ignore a document, it is important for writers to ensure they choose the most appropriate medium for their message.

Consequently, Marshal McLuhan discusses exactly this notion in his book *The Medium Is The Massage*.

McLuhan compares the content in television shows to that of commercials, observing that while the former has plenty of time (literally) to set up and describe a situation, the latter does not, and so must improvise (Agel et al., 2001, p. 126). In adjusting to a 30-second spot, commercials actually comprehend the importance of format better than do the shows:

"Most often the few seconds sandwiched between the hours of viewing – the 'commercials' – reflect a truer understanding of the medium. There simply is no time for the narrative form, borrowed from earlier print technology. The story line must be abandoned. Up until very recently, television commercials were regarded as simply a bastard form, or vulgar folk art" (Agel et al., 2001, p. 126).

Tailoring the format of a document is an important issue when dealing with dyslexics, as Blankfield, Davey and Sackville discovered in their research that created a set of guidelines for tutors to follow to make online courses more accessible to dyslexic students. Identifying the most appropriate format in which to present documents to such students determines how easy it will be for them to use and access the document (Blankfield et al., 2002, Document formats section, p. 5).

An excellent example of the importance of tailoring format to the audience concerns resumes. According to J. Michael Worthington, Jr. of ResumeDoctor,

"A job seeker must customize his/her resume for each and every job he/she is seeking. This means do not bury important details. Provide your reader with an effective summary tailored to each position, etc. What might be a hot button to one employer concerning your background, may not be the most important skill to another" (n.d., # 1 - Spelling Errors, Typos and Poor Grammar section, para. 9).

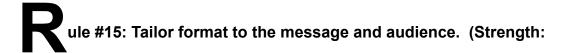
Source Reliability: 10/10

### Conclusion:

While the two style manuals only touch upon the subject of tailored format, academic and scientific data recognizes its importance, and therefore supports the manuals. Writers would best serve their audience by adjusting their document's format to one that is appropriate to the message they seek to convey. For example, brief documents would best serve a crisis, emails can suffice in responding to real-time requests for information, and briefings may be the best vehicle for information when the analyst anticipates many questions from the decisionmaker. Additionally, long documents, such as National Intelligence Estimates (NIEs) are typically the format of choice for in-depth

reporting and long-term forecasts. Analysts can also tailor their format specifically to their decisionmaker's preferences, adjusting, perhaps, font style, color scheme, and incorporating or limiting graphics and charts. These would all support the 'Decisionmaker-focused' maxim, which was the most common request from decisionmakers.

**Analytic Confidence: 8.5/10** 



9.25/10)

### **Font**

Two categories are associated with font: the characteristics of the font itself and text formatting.

## Font According To...

### **Style Manuals:**

Writers should use Times New Roman font, size 12 (USAMC, 2003, p. D-1), or at least another serif font for the body of reports and memos as serifs are more readable than sans serifs (USAMC, 2003, p. 38). Sans serif fonts are more *legible*, however, and writers should employ them for "shorter memos or for short text blocks like titles, labels, and headings" (USAMC, 2003, p. 36).

Sasse advises, "Except for shorter memos or for short text blocks like titles, labels, and headings, serif fonts are preferable because they are more readable. Serif fonts have the distinguishing features...that give the reader more visual cues" (2000, p. 36).

Twelve-point font, the most common size, is best for body text, especially when using Times New Roman (USAMC, 2003, p. 36). "Of course, headings and titles may have bigger sizes like 14 or even 18-point" (USAMC, 2003, p. 36).

Writers should utilize different type styles to give their readers visual cues (USAMC, 2003, Figure 10. Type Styles section, p. 37).

Overall, writers must maintain consistency with font styles and sizes (USAMC, 2003, p. 38), and must keep the text readable, that is, avoiding long lines of text (over 65-70 characters) or long chunks of underlined or all caps text (USAMC, 2003, p. 38).

# Academia, Science And Experts: General

Choosing the right font for a document may seem a simple task, since people typically use one of a small handful of possible typefaces for their documents – Times New Roman, Garamond, Arial, Verdana, and Courier New, for example. Writers should not make this decision hastily, however, as the science behind the fonts reveals a number of factors that determine the appropriate font for particular situations. The subject of font then breaks into four categories: legibility, readability, personality, and serif versus sans serif.

## **Typographic Clarity**

Two factors affect typographic clarity: legibility and readability (Haley, n.d., para. 1). **Legibility** 

Allan Haley, Creative Director for Monotype Imaging, Inc., states, "Legibility is a function of typeface design. It's an informal measure of how easy it is to distinguish one letter from another in a particular typeface" (n.d., para. 1).

"A long-standing typographic maxim is that the most legible typefaces are 'transparent' to the reader—that is, they don't call undue attention to themselves" (Haley, n.d., Three Aspects of Legibility section, para. 1).

The most legible typefaces have two main characteristics: they contain big features – for example, the white spaces in letters like 'e', 'o' and 'b' are large and open; and they have "restrained design characteristics", that is, they are "not excessively light or bold, weight changes within character strokes are subtle, and serifs," if any, are not obvious (Haley, n.d., Three Aspects of Legibility section, para. 1).

Legibility involves letter recognition, states Kathleen Yoshida of FGM, Inc., who further points out that readers "shouldn't have to struggle to recognize the word forms" in documents (2001, Legibility section, p. 6). Using a sans serif font is one way to increase legibility (Yoshida, 2001, Legibility section, p. 6).

"[A]s readable as possible" makes for a visually effective document, according to Ruth Anne Robbins of Rutgers (2004, The Science Behind the Advice section, p. 113). She notes that when studying reading – how people learn and best accomplish it – psychological studies are of two categories: organization, or the document's overall

structure<sup>13</sup>; and legibility, "the effects of typographical features on the efficiency of reading perception" (Robbins, 2004, The Science Behind the Advice section, p. 114).

Psychologists measure legibility, then, by the ease and speed of reading (Robbins, 2004, The little things do matter section, p. 114). Drs. Miles A. Tinker and Donald G. Paterson found that two factors affecting legibility are font type and size (Robbins, 2004, The little things do matter section, p. 114).

### Readability

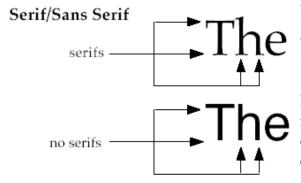
Readability depends on "how the typeface is used. Readability is about typography. It is a gauge of how easily words, phrases and blocks of copy can be read" (Haley, n.d., para. 1; Yoshida, 2001, Readability section, p. 8), and is important because it affects eyestrain and fatigue (Yoshida, 2001, Readability section, p. 8).

## Readability factors include:

- "using a serif typeface" (Yoshida, 2001, Readability section, p. 8);
- "selecting a typeface with a large x-height" (Yoshida, 2001, Readability section, p. 8);
- "selecting a reasonable point size" (Yoshida, 2001, Readability section, p. 8); and
- "restraining your use of multiple fonts" (Yoshida, 2001, Readability section, p. 8).

### **Serif Fonts**

"A 'serif' or 'wing' is the extra little line dangling on the bottom of letters" (Robbins, 2004, Serif Or Not To Serif section, p. 119) (See Figure 6). This font style makes large bodies of text easier to read as the serifs "lead the eye from one letter to the



next" (Robbins, 2004, Serif Or Not To Serif section, p. 119), making it easier to track from left to right (Wanderman, n.d., Serif/Sans Serif section, para. 2).

Robbins points out, however, that while minimal science supports the 'serif = easier reading' theory, the evidence is not conclusive (2004, Serif Or Not To Serif

section, p. 120). Researchers of a 1981 study found, "overall the serif fonts had greater legibility than sans serif" (Robbins, 2004, Serif Or Not To Serif section, p. 120). Studies by Drs. Tinker and Paterson support this, but showed only "a slight 2.2% difference in reading speed" between Roman, a serif font, and Kabel, a sans serif (Robbins, 2004, Serif Or Not To Serif section, p. 120).

Nadav Savio, "a web developer/designer who specializes in... "making websites that work" (O'Reilly Network, n.d., Nadav Savio section, para. 1), concurs with Robbins that serifs, in themselves, do not necessarily affect legibility.

"The logic is that the serifs emphasize the horizontal motion necessary to read a line of text and simultaneously help differentiate the letters. But this is an oversimplification, and like most oversimplifications it can be misleading. Other factors, such as aperture size and letter-, word-, and line-spacing have a far greater impact on overall legibility. In addition, on the low resolution of computer screens, serifs often serve only to muddy already indistinct letterforms" (Savio, n.d., Serifs vs Sans-serifs section, para. 1).

Nevertheless, "The popular view among graphic design experts is to use serif fonts, like Times or Garamond, for large blocks of text", as they conclude that serifs are easier to read (Robbins, 2004, Serif Or Not To Serif section, p. 119-20).

### **Sans Serif Fonts**

Sans serif fonts lack the 'wings' of the serifs. "Sans" means "without" in French, hence "sans serif is 'without wings" (Robbins, 2004, Serif Or Not To Serif section, p. 119). The sans serif "letterform is neat, defined, clean. They are mostly used for titles, captions, callouts, and in general any time there is not too much text and readability is an issue" (Good, 2004, para. 8). Arial (Arial) and Verdana (Verdana) are two of the most common sans serif fonts.

Sans serifs are easier to read on the computer screen (Robbins, 2004, Contrast: Vary fonts, not capitalization within the same font section, p. 127; Savio, n.d., Serifs vs Sansserifs section, para. 1). They also project well, "so they can be ideal for presentations" (Yoshida, 2001, Typeface Combinations section, p. 23) and overheads (Robbins, 2004, Contrast: Vary fonts, not capitalization within the same font section, p. 127).

### **Properly Applying Serifs & Sans Serifs**

'Serif font for body text, sans serif font for headings and titles' is the most common advice from academia and science (Howe, 2005, para. 5; Robbins, 2004, Contrast: Vary fonts, not capitalization within the same font section, p. 127; O'Sullivan, n.d., General

rules for word choice section, p. 1; Yoshida, 2001, Typeface Combinations section, p. 23).

"Serif fonts are easier to read in standard paragraph text. Sans serif fonts are easier to read in short or single-word titles", declares John Howe, Professor of Management & Marketing and Department Chair at Santa Ana College in California (2005, para. 5). "Do not mix more than two fonts in a single document", however (O'Sullivan, n.d., General rules for word choice section, p. 1; Howe, 2005, para. 6).

Kathleen Yoshida lists some recommended serif/sans serif font pairs:

- Times New Roman/Arial;
- Palatino/Avant Garde; and
- Book Antiqua/Futura (Yoshida, 2001, Recommended Pairs section, p. 23).

"Sans serif fonts...provide a visual contrast to serif fonts.... To provide more visual contrast, use boldface or a heavier weight sans serif font" (Robbins, 2004, Contrast: Vary fonts, not capitalization within the same font section, p. 127).

One aspect of ResumeDoctor's pet peeve number fourteen – "poor font choice" – directed writers to use font that is "simple and easy to read on a computer screen" by avoiding "difficult to read fonts like Edwardian Script" (Worthington, n.d., # 14 - Poor Font Choice section, para. 1) (this is Edwardian < that is Edwardian 12-point).

Job seekers should instead use 10-point Arial (Arial 10-point) as "People are accustomed to reading such on their computer screen" (Worthington, n.d., # 14 - Poor Font Choice section, para. 2). "For headings, recruiters shared that 12-point bolded is the best choice" (Worthington, n.d., # 14 - Poor Font Choice section, para. 2). Times New Roman, in 11- or 12-point (10-point is too small), is the second best font choice "as every newspaper and magazine is printing with such...[and] people's eyes are accustomed to reading text in this font" (Worthington, n.d., # 14 - Poor Font Choice section, para. 3).

### Size

Large font sizes are "beneficial for reducing eye fatigue" (Thompson, Johnstone, & Thurlow, 2002, Type Size section, para. 5) and "are most effective for young students who are learning to read and for students with visual difficulties" (Thompson et al., 2002, Type Size section, para. 4). The readability-point size relationship, however, depends on the typeface used (Thompson et al., 2002, Type Size section, para. 6). For example, this text is Times New Roman 12-point, and this text, which is larger, is Arial – 12-point.

While writers most commonly employ twelve- and ten-point fonts for readers with "excellent vision reading in good light" (Thompson et al., 2002, Type Size section, para. 1), during testing, fourteen-point type "increases readability and can increase...scores for both students with and without disabilities" (Thompson et al., 2002, Type Size section, para. 2).

"Type size for captions, footnotes, keys, and legends need to be at least 12 point also" (Thompson et al., 2002, Type Size section, para. 3).

In "poor font choice", ResumeDoctor's pet peeve number fourteen, J. Michael Worthington, Jr. asserts, "Font size is just as important as style. 8-point fonts are too small to read, even for Superman" (n.d., # 14 - Poor Font Choice section, para. 1).

Source Reliability: 7.7/10

### Conclusion:

The style manuals are correct in recommending serif font for body text – due to it being more readable – and sans serifs for short text blocks like titles. They also correctly purport, essentially, a 12-point font (though actual font size depends on typeface), as well as the idea of employing different type styles, that is, a serif with a sans serif, as a way of providing the reader with visual cues. The manuals should point out, however, that while serifs are best for printed material, writers should use sans serif fonts when their audience must read from a computer screen or an overhead. Adjusting font type according to the delivery mechanism is therefore implicitly part of the 'Decisionmakerfocused' maxim. Knowing when to use serifs and sans serifs also explicitly serves to ensure 'Clarity' and 'Packaging'.

**Analytic Confidence: 9.5/10** 

ule #16: Serifs for body text, sans serifs for headings and on-

screen, and 12-point default size. (Strength: 8.6/10)

Text Formatting According To...

**Style Manuals:** 

Both Sasse and the USAMC work to ensure readability when they discuss proper text formatting. Both allow writers' use of all caps only in small blocks of text (Sasse, 2000, p. 38; USAMC, 2003, p. B-1). The latter extends this principle to include the use of bold and italics as well (2003, Figure 8. Use Styles Prudently section, p. 37), while the former permits it.

The CIA allows writers to use italics "to give prominence or emphasis to particular words and phrases", but notes writers should use it sparingly "to avoid the excessive use that defeats the primary purpose of italicizing" (1999, p. 61).

Sasse warns writers to "Avoid underlining when giving text effect—[it is] better to use italics, bold, larger type, or white space. Underlines interfere with text features and degrade readability" (2000, p. 38).

USAMC also directs writers to use "real quotation marks", and not "the ones that are straight up and down" (2003, Figure 11. Special Characters section, p. 37).

# Academia, Science And Experts: General

Text formatting, used to emphasize text and bring contrast to important pieces of information, is a valuable tool for writers. For example, the Eyetrack study by Outing and Ruel found that, as people's eyes start to scan through the bottom of the text, they look for "something to grab their attention" and their "eyes may fixate on an interesting headline or a stand-out word, but not on other content" (n.d., What creates "hot spots"? section, para. 3).

However, Teresa O'Sullivan, PharmD, a lecturer at University of Washington's Department of Pharmacy, cautions, "Use underlines, italics, and bold correctly" (n.d., General rules for word choice section, p. 1).

### **ALL CAPS**

"Do not use CAPITALS, except for acronyms", declares Teresa O'Sullivan (n.d., General rules for word choice section, p. 1). Publications that appeal to emotions, rather than reason, use capitals; this will make information "appear to be emotion-based, rather than evidence-based" (O'Sullivan, n.d., General rules for word choice section, p. 1).

"TEXT PRINTED COMPLETELY IN CAPITAL LETTERS IS LESS LEGIBLE THAN TEXT PRINTED COMPLETELY IN LOWER-CASE, OR NORMAL MIXED-

CASE TEXT", ACCORDING TO CARTER, DAY AND MEGGS (THOMPSON, JOHNSTONE & THURLOW, 2002, TYPEFACE SECTION, PARA. 3), ALL PROFESSORS AT VIRGINIA COMMONWEALTH UNIVERSITY WHO ARE WELL-RECOGNIZED FOR THEIR WORK IN DESIGN (WILEY.COM, N.D., PARAS. 1-3) [all caps not part of original document; emphasis added by the author].

### Or:

"Text printed completely in capital letters is less legible than text printed completely in lower-case, or normal mixed-case text", according to Carter, Day and Meggs (Thompson, Johnstone & Thurlow, 2002, Typeface section, para. 3), all professors at Virginia Commonwealth University who are well-recognized for their work in design (Wiley.com, n.d., paras. 1-3).

To make reading easier for dyslexics, Rainger cautions against using all caps as "Text in all-capitals is much harder to read than normal-case continuous text" (Rainger, 2003, Avoid the use of capital texts section, p. 7). Employing all caps for one or two words "should not create too many reading problems", but capitalizing whole sentences "can be visually distracting and annoying to the reader" (Rainger, 2003, Avoid the use of capital texts section, p. 7).

Body text should be in mixed case, as "[l]ower case letters are easier to read", according to Richard Wanderman, educational consultant on learning disabilities and founder of LD Resources (Wanderman, n.d., Case section, para. 1).

Ruth Anne Robbins, in an aptly titled section "Stop screaming at me in rectangles", calls for the retirement of all caps in documents (2004, p. 116). "Using all caps adds nothing to the document and, in fact, detracts from the overall effect" (Robbins, 2004, Stop screaming at me in rectangles section, p. 116).

It also lengthens reading time by 9.5-19 percent, or 12-13 percent on average, when compared to regular sentence case (Robbins, 2004, Stop screaming at me in rectangles section, p. 115). "That translates to 38 words/minute slower than using sentence case" (Robbins, 2004, Stop screaming at me in rectangles section, p. 115).

Drs. Tinker and Paterson, who reported these findings, also found that 90 percent of their study's participants preferred lower case text for legibility (Robbins, 2004, Stop screaming at me in rectangles section, p. 115).

Robbins adds that the preference for sentence case letters stems from the fact that at least partly, people read according to the shape of the top half of letters (2004, Stop screaming at me in rectangles section, p. 116). It is easy to read this statement, for example, when only the top halves of the letters are visible:

Conversely, it is difficult to read the same statement from just the bottom halves of the letters:

# People read the top half of letters.

Using all caps "precludes reading by shape and instead shows the reader only monotonous rectangles" (Robbins, 2004, Stop screaming at me in rectangles section, p. 116). Without a shape distinction, they must then read each letter individually (Robbins, 2004, Stop screaming at me in rectangles section, p. 116).

#### Bold

"Boldface is more visible than lower case if a change from the norm is needed", state Thompson, Johnstone, & Thurlow (2002, Typeface section, para. 5).

Richard Wanderman, educational consultant on learning disabilities, also notes that bold words "stand out and are easier to find on a page", but, for best results, cautions writers to be consistent and prudent when using this and other formatting styles (n.d., Style section, para. 1).

Use bold only for headings and major subheadings, but not for emphasis, asserts Teresa O'Sullivan (n.d., General rules for word choice section, p. 1). However, if writers choose to emphasize text with bold, then *do not combine it with italics* or another formatting (O'Sullivan, n.d., General rules for word choice section, p. 1) [all emphasis added].

According to Ilene Strizver, writer for Upper & Lower Case Magazine, "Boldface creates emphasis by contrasting lighter and heavier weights of the same typeface... [and] is often used for captions, subheads and stand-alone words and phrases" (2001, Boldface section, para. 1). She advocates that writers use this formatting sparingly, and only when they desire a strong emphasis as bolded text "creates a harsh visual interruption" (Strizver, 2001, Boldface section, para. 1).

Drs. Tinker and Paterson "recommend boldface as the cueing device of choice" when writers need to emphasize text (Robbins, 2004, p. 119). In their studies, Tinker and Paterson "discovered no difference in the speed of reading boldface letters" when compared to un-bolded letters, and noted that readers can perceive bold text "at a greater distance than letters in lower case print" (Robbins, 2004, p. 119). Further, one-third of their test participants "actually preferred boldface" (Robbins, 2004, p. 119).

### **Italics**

Use italics for emphasis, but do not overuse them, according to Teresa O'Sullivan (n.d., General rules for word choice section, p. 1). For Thompson, Johnstone and Thurlow, "Italic is far less legible and is read considerably more slowly than regular lower case" (2002, Typeface section, para. 4) [emphasis added].

In general, italics slow reading time up to 4.5 percent, and up to 10 percent where there was poor lighting and small font size, as Drs. Tinker and Paterson found in their studies (Robbins, 2004, I Scream, You Scream section, p. 118). Ninety-six percent of their participants also preferred non-italicized print (Robbins, 2004, Footnote 39, p. 118). From this, Ruth Anne Robbins concludes, "The science really supports either proposition", and "italics in a citation probably doesn't hurt anything. But the wise attorney would do well to avoid italicizing a whole passage" (Robbins, 2004, I Scream, You Scream section, p. 118).

Ilene Strizver considers italics ideal "for creating subtle emphasis of words or phrases" as this formatting style draws attention "without making a major change in the color of the text" (2001, Italics and Obliques section, para. 3).

In ResumeDoctor's pet peeve number fourteen, "poor font choice", however, J. Michael Worthington, Jr. suggested writers "Be kind to your reader", and cautioned them not to use italics (n.d., # 14 - Poor Font Choice section, para. 1).

### <u>Underline</u>

Do not underline to emphasize, states Teresa O'Sullivan (n.d., General rules for words choice section, p. 1). "Underlining is for typewriters", and publications use it when trying appeal to emotions, rather than reason (O'Sullivan, n.d., General rules for word choice section, p. 1). People also now think "hyperlink" when they see an underlined word (O'Sullivan, n.d., General rules for word choice section, p. 1).

Like O'Sullivan, Peter Rainger also recognizes that readers can become confused when faced with underlined text as it typically indicates a hyperlink (2003, Avoid underlining except for hyperlinks section, p. 7). He affirms, "Don't underline large blocks of text as

it makes reading harder" (Rainger, 2003, Avoid underlining except for hyperlinks section, p. 7).

Ruth Anne Robbins, referring to a study by Drs. Miles A. Tinker and Donald G. Paterson, concludes it seems likely that underlined text slows reading rates – by as much as 8-11 percent when mixed with other formatting – as underlining "skews the visual pattern of letters" (2004, I Scream, You Scream section, p. 118) [emphasis added].

Underlining headlines or headings discourages people from reading the text immediately below. Steve Outing and Laura Ruel's Eyetrack study found that people did not read "blurbs", or the short caption about a news story, when the title above it was underlined (n.d., Want people to read, not scan? Consider small type section, para. 7). "This may be related to a phenomenon that we noted throughout the testing: visual breaks -- like a line or rule -- discouraged people from looking at items beyond the break, like a blurb" (Outing & Ruel, n.d., Want people to read, not scan? Consider small type section, para. 1).

Source Reliability: 8.75/10

### Conclusion:

The two manuals – Sasse and USAMC – that permit all caps (albeit only in small blocks of text) should instead discourage this completely. Sasse is correct, however, in warning writers to avoid underlining. According to academia and science, writers should completely avoid all caps, except for acronyms; bold is the best format for headlines and have no effect on reading speed, though writers should use it sparingly when simply emphasizing text. Italics are subtle, and are the best choice for emphasis, though they slow reading time and writers should italicize only small blocks of text. Except for hyperlinks, writers need to avoid underlining altogether. Proper text formatting is an explicit part of 'Packaging' and implicit in ensuring a document's 'Clarity'.

**Analytic Confidence: 9.5/10** 

ule #17: Bold for headings, italics for emphasis, underline for

hyperlinks only, and all caps never. (Strength: 9.13/10)

# **Graphics**

As style manuals broach the subject only briefly, there are no divisions in the graphics section.

## **Graphics According To...**

### Style Manuals:

Graphics play an important role in "meeting the needs of the audience", according to Sasse, but there are some general guidelines for writers to follow when considering using them in a document (2000, p. 39). "Typically, graphics are determined and created after you analyze the data and determine the organizing ideas" and so writers should "use graphics (tables or figures) to lend support or emphasis to [the main] ideas found in the text of the report" (Sasse, 2000, p. 39).

Writers should place graphics near the text they describe, "preferably immediately following the paragraph they are referenced", and tables or graphs should never appear before the text that discusses them (Sasse, 2000, p. 39).

"Tables should be concise and focused, emphasizing a point being made or illustrating more clearly that point" and "should be an integral part of the message you are presenting" (Sasse, 2000, p. 39). Title and label all graphics to be descriptive enough that readers understand, based on the title alone, what the graphic is about (Sasse, 2000, p. 39).

### **Academia, Science And Experts:**

The popular cliché "A picture is worth a thousand words" is not only true, it is helpful. Pictures, graphics and visuals of any kind convey masses of data in a single snapshot that the perceiver may carry with them to interpret later on. Incorporating graphics into any document then, is important for the space-saving characteristics as well as the value. Moreover, as Marshal McLuhan points out, in *The Medium Is The Massage*, people like to "see" things:

"Most people find it difficult to understand purely verbal concepts. They <u>suspect</u> the ear; they don't trust it. In general we feel more secure when things are <u>visible</u>, when we can 'see for ourselves.' We admonish children, for instance, to 'believe only half of what they <u>see</u>, and nothing of what they <u>hear</u>.' All kinds of 'shorthand' systems of notation have been developed to help us <u>see</u> what we hear.

"We employ visual and spatial metaphors for a great many everyday expressions. We <u>insist</u> on employing visual metaphors even when we refer to purely psychological states, such as tendency and duration. For instance, we

say <u>there</u>after when we really mean <u>then</u>after, always when we mean at all times. We are so visually biased that we call our wisest men <u>vision</u>aries, or <u>see</u>rs!" (Agel et al., 2001, p. 117).<sup>14</sup>

Graphics contribute to documents in many ways, for example, by breaking up the text, by showing in one picture or chart what it would take an entire paragraph to explain, and by fortifying what is already in the text. Some "Don'ts" of graphics according to Dr. John Morkes and Jakob Nielsen – don't:

- use a graphic without explaining it in the text; introduce or explain it in the text that surrounds it;
- use a graphic just because (1997, Graphics and Text Should Complement One Another section, para. 1) all graphics should be relevant to the text;
- forget to put a caption with the graphic (1997, Graphics and Text Should Complement One Another section, para. 1) always write one sentence that tells the reader something about the graphic.

According to Miguel A. Cortes, a graduate student at San Diego State University, "Bullets, icons, punctuation marks, and visuals... serve to emphasize and supplement text", but designers should use them sparingly, and "only to enhance the content, not as window dressing" (Cortes, n.d., Graphic section, para. 1).

Offering tips to make White Papers succeed, Klariti Writing Services, who provide writing services across Ireland and the European Union (EU), notes, "Attractive graphics will reinforce the message you intend to convey. Diagrams and charts will also stop 'glazed eyes syndrome'" that occurs when readers encounter numerous pages of text (Klariti, n.d., Sharp Presentation section, para. 1). As text-heavy documents "drain the reader very quickly", Klariti recommends combining "charts, diagrams and tables to reinforce the main selling points and sustain their interest" (n.d., Sharp Presentation section, para. 1).

In research designed to create a set of guidelines for tutors to follow to make online courses more accessible to dyslexic students, Blankfield, Davey and Sackville found that these students immediately gravitated towards graphics. They "used pictorial elements (icons) as their first cues to identify course content, but used accompanying text...to help clarify that content" (Blankfield et al., 2002, Pictorial cues section, p. 5, para. 1).

Citing the above research, Rainger suggests using "graphics, images, and pictures to break up text, whilst remembering that graphics should be relevant to the material and not distract from the content" (2003, Page design issues, p. 5).

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<sup>&</sup>lt;sup>14</sup> Note: all underlining is from the original text. The author added no emphasis.

Thompson, Johnstone and Thurlow's universal design research found that symbols "used on graphs need to be highly distinguishable" and designers should place labels directly next to indicators, "enabling people to find information more quickly than when a legend or key is used, and reducing the load on short-term memory" (2002, Legible Graphs, Tables, and Illustrations section, para. 1).

Graphical displays must also create "a context for interpreting data" so that "readers can construct appropriate inferences about [it]" (Thompson et al., 2002, Legible Graphs, Tables, and Illustrations section, para. 1).

Studies designed to uncover computer design principles that maximize completion rates and test-taking speed show that principles "of unity, focal point, and balance... reduce the cognitive load of perceiving graphic information," and increase the speed of information perception and test-taking involving graphic material (Thompson et al., 2002, Legible Graphs, Tables, and Illustrations section, para. 7).

Source Reliability: 8.1/10

### Conclusion:

Sasse, the lone style manual, is correct in advising writers to include graphics in their documents. Academic and scientific data recommend using graphics wisely, and ensuring they are relevant to the text and clearly explained, but not distracting. Relevant intelligence graphics include maps, charted economic data and photographs of people mentioned in the document. Since a picture *can save* a thousand words, graphics can contribute to 'Concision'. They can also help to ensure 'Clarity' by showing – as opposed to telling – the decisionmaker the key points, and add to the attractiveness and user-friendliness of good 'Packaging'. A graphic can also be a 'Bottom Line Up Front', in and of itself.

**Analytic Confidence: 10/10** 

ule #18: Properly done, graphics add significantly to text.

(Strength: 9.1/10)

# **Spacing**

Five subcategories fall under the Spacing heading. These are justification, line length, margins, spacing (in general), and white space.

## **Justification According To...**

### Style Manuals:

Three style manuals agree that writers should left-justify their text (NACAC, n.d., p. 2; Sasse, 2000, p. 38; USAMC, 2003, p. B-1) and two explicitly caution against right-justifying (Sasse, 2000, p. 38; USAMC, 2003, p. B-1) as it "creates abnormal spacing between characters and words in the line, compromising readability" (Sasse, 2000, p. 38). For readability, according to USAMC, "avoid full justification except with very short columns of text (e.g., newsletters)" (2003, Figure 9: Justification of Text section, p. 37).

## Academia, Science And Experts:

Peter Rainger of the University of Sussex suggests left-justified<sup>15</sup> text is easier for dyslexics to read, as full-justified "text causes uneven inter-word spacing, which can create 'rivers of white space' for some dyslexics" (2003, Keep to left aligned, unjustified text section, p. 7).

Thompson, Johnstone and Thurlow's survey regarding appropriate justification reveals that fully justified text is least effective as it:

- requires "the distances between words to be varied. In very narrow columns, not only are there extra wide spaces between words, but also between letters within the words" (2002, Justification section, para. 6);
- "is more difficult to read than unjustified text especially for poor readers" (2002, Justification section, para. 2); and
- "is also more disruptive for good readers" (2002, Justification section, para. 3).

Unjustified text (either left- or right-justified) is therefore best, and "may be easier for poorer readers to understand because the uneven eye movements created in justified text can interrupt reading" (Thompson et al., 2002, Justification section, para. 5). Of the two choices, writers should employ left-justification because:

 staggered "right margins are easier to see and scan than uniform or block style right justified margins" (Thompson et al., 2002, Justification section, para. 1);
 and

<sup>&</sup>lt;sup>15</sup> Left-justified text is also known as "flush left, ragged right"; right-justified is flush right, ragged left. Fully-justified text is flush left, flush right, so that both sides are perfectly in line. Full justification is most common in news media and books. As an example, this footnote is fully justified. Note the wide spaces between words on the first three lines.

• a "flush left/ragged right margin is the most effective format for text memory" (Thompson et al., 2002, Justification section, para. 4).

Left-justification, according to Thompson et al.'s results, is therefore the best, most effective and readable choice.

Richard Wanderman, educational consultant on learning disabilities and founder of LD Resources, agrees with Thompson et al.'s findings. Flush left, ragged right "is the easiest line formatting to read in bodies of text" (Wanderman, n.d., Justification and Line Tracking section, para. 1), whereas text formatted flush right, ragged left makes it harder to read large pieces of text (Wanderman, n.d., Justification and Line Tracking section, para. 2).

Fully justified text, used often in books, magazines and newsletters, is also more difficult to read than flush left, ragged right (Wanderman, n.d., Justification and Line Tracking section, para. 3).

"The reason is that when the text is flush on the right, one loses the ability to use line lengths as a tracking device. One of the hardest parts of learning to read (before you read for content and can intuit the next word) is getting from the end of one line to the beginning of the next. This diagonal tracking is made easier when the right edge of the text is ragged and there are some visual/ spatial landmarks to anchor your peripheral vision to. Fully justified text makes it harder to perform this part of the reading task until you are reading for content and can guess the next word and so, look for it on the next line" (Wanderman, n.d., Justification and Line Tracking section, para. 3).

"Readability studies tend to favour [sic] flush left, ragged right alignment, the ragged right margin giving publications a lighter look", states Albert Goodman, a teacher for the Multimedia Technology degree program at Australia's Deakin University (n.d., Flush Left, Ragged Right section, para. 1).

Fully-justified type, on the other hand, is more difficult to read because of "the gaps between words" (Goodman, n.d., Justified section, para. 1), and writers should only use center-justified text for short headings, as "readers have to search for the beginning of each line" when employed for long blocks of text (Goodman, n.d., Centred [sic] section, para. 1). Right-justified type "also slows reading down but it may be appropriate to use with short blocks of type when it is necessary to align the type to a photo on the right" (Goodman, n.d., Flush Right, Ragged Left section, para. 1).

Ruth Anne Robbins advises attorneys to stick to left justified text as it is both most common and experts consider it the easiest to read (2004, Alignment section, p. 130) as it "affords the greatest legibility...[and] 'the resulting "ragged" right margin adds

variety and interest to the page without interfering with legibility" (Robbins, 2004, There Isn't Much Justification For Justified Text section, p. 130).

Robbins observes, however, that while most design experts favor left alignment, not all agree (2004, There Isn't Much Justification For Justified Text section, p. 130). Fully-justified text "is common practice in professional writing", though the uneven spacing between words that results can jeopardize legibility, and the resulting text blocks "often suffer from poor spacing and excessive hyphenation" (Robbins, 2004, There Isn't Much Justification For Justified Text section, p. 130).

Additionally, Robbins does not recommend mixing justifications – particularly centered – for a couple of reasons. First, other visual cues and design elements already serve to alert the reader; center alignment is therefore unnecessary and may actually make the document less legible, especially when combined with indents (Robbins, 2004, Centered And Left-aligned Text Don't Match section, p. 131). Second, "mixing alignments can…make it difficult for the reader to determine where in the outline hierarchy a centered heading belongs" (Robbins, 2004, Centered And Left-aligned Text Don't Match section, p. 131).

Writing for Upper & Lower Case Magazine, Ilene Strizver recommends wise writers avoid fully-justified text "unless there's a compelling reason to do so, and only when he or she has the time and flexibility to fine-tune the text" (2001, para. 4).

"Used well, justified type can look clean and classy" (Strizver, 2001, para. 1). Properly justifying text is tricky to master, however, and carelessly set justification can make text appear distorted and difficult to read (Strizver, 2001, para. 1).

Strizver outlines some potential problems:

"Too much additional space can create gaping holes between words, as well as rivers of white space flowing down your text. Too much compression makes type look cramped and squished, especially when compared to adjacent, generously spaced lines. All of this manipulation can severely degrade the color, texture and readability of your type" (2001, para. 3).

Source Reliability: 8.9/10

### Conclusion:

The style manual guidelines are right on target when they advise writers to use left justification and avoid fully- and right-justified text. While full justification can be attractive, it is difficult to work with and even when properly employed can lead to unnatural gaps between words and excessive hyphenation, both of which serve to decrease readability and legibility. Implicit in the decisionmakers' demand for good

'Packaging' is the idea of analysts choosing the best and most effective justification – flush left, ragged right.

Analytic Confidence: 10/10

ule #19: Use left-justified text. (Strength: 9.45/10)

# Line Length According To...

### Style Manuals:

The USAMC contends the text of Daily Information Summaries (DISUMs) "must not

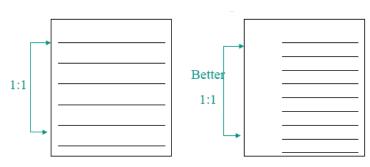


Figure 7. "Readability is...improved by using lines 40-60 characters long" (Sasse, 2000, p. 34, para. 5). Source: Sasse, 2000, Figure 5: Shifting White Space section, p. 35.

exceed 52 characters per line" and there can be no more than fifteen lines of text in the body (2003, p. B-1). Sasse supports this view, noting that writers can improve readability "by shortening the line width to about 40-55 characters"; one way to do this is by shortening the margins, as Figure 7 illustrates (2000, p. 34). "If you do shift the margin you

do not want to use double spacing. However, single space can still make the page too busy. Therefore, you will want to create a little space between line [sic] through leading" (for more information on leading, see *Spacing*, this section) (2000, p. 34).

Sasse cautions writers to keep text readable by avoiding long lines of text (over 65-70 characters) (2000, p. 38).

### Academia, Science And Experts:

A 2003 evidence-based study by the National Cancer Institute (NCI) on web usability and design guidelines (NCI, 2003, What's the purpose of this site? section, para. 1)

suggests that although online users "tend to prefer shorter line lengths", they "read faster when line lengths are long" (NCI, 2003, Use Reading Performance or Reader Preference section, para. 2). If reading speed, rather than user preference, is important, then, writers should employ "longer line lengths (100 characters per line) rather than shorter line lengths (55 characters per line)" (NCI, 2003, Use Reading Performance or Reader Preference section, para. 1).

Unlike NCI, Thompson, Johnstone and Thurlow do not distinguish between user preference and reading speed, and simply state that optimal line length is about four inches (2002, Line Length section, para. 2), with about forty-seventy characters (or eight-twelve words) per line (2002, Line Length section, para. 4). "Lines that are too long make readers weary and may also cause difficulty in locating the beginning of the next line, causing readers to lose their place" (Thompson et al., 2002, Line Length section, para. 3). They also tend to require "larger type and more leading" (Thompson et al., 2002, Line Length section, para. 1).

When writing for dyslexics, line length should not exceed 60-70 characters in documents, Peter Rainger notes (2003, Keep to left aligned, un-justified text section, p. 7). "Lines that are too long or short can put strain on eyes due to increased physical movement" (Rainger, 2003, Keep to left aligned, un-justified text section, p. 7).

Richard Wanderman, educational consultant on learning disabilities and founder of LD Resources, asserts that longer lines are more difficult for beginner readers to track than shorter lines when font size is 12-point (n.d., Column Width and Line Tracking section, para. 1).

Line length affects legibility "because of the way the eye reads a document", states Ruth Anne Robbins (2004, Length Doesn't Matter section, p. 122). When reading, people employ their peripheral vision to help guide them from the end of the text to the start of the next line; the time in between reading is a 'fixation pause' (Robbins, 2004, Length Doesn't Matter section, p. 122). "When there are fewer fixation pauses, there is greater retention and comprehension" (Robbins, 2004, Length Doesn't Matter section, p. 122).

Lines that are too short appear to reduce legibility as "readers cannot effectively employ their peripheral vision", and too-long lines demand long fixation pauses while the reader's "head moves and their eyes search for the beginning of the next line" (Robbins, 2004, Length Doesn't Matter section, p. 122).

Optimal line length depends on font size, however, and according to Robbins, legibility decreases by over 3 percent when writers use 12-point font with 6.5 inches of text (that is, 1-inch margins on an 8.5 X 11 inch sheet of paper) (2004, Length Doesn't Matter section, pp. 122-3). From this data, modern publications like newspapers allege "the

ideal line length for 12-point type should range from 2.75 to 4 inches" (2004, Length Doesn't Matter section, p. 123).

Source Reliability: 8.7/10

#### Conclusion:

The style manuals recommend line lengths between forty and seventy characters, and academia and science support this. While longer lines possibly enable faster reading, reader performance, legibility and comprehension increases with smaller line lengths. Lines at either extreme, that is, lines that are too long or too short, have negative physical affects on readers, especially those with learning disabilities. Analysts should consider this when designing 'Packaging' for the decisionmaker's optimal comprehension.

**Analytic Confidence: 9/10** 

ule #20: Optimal line length equals forty to seventy characters

(eight to ten words) per line. (Strength: 8.85/10)

# Margins According To...

### Style Manuals:

USAMC suggests writers set all margins at one inch, except for top margins and letterhead (2003, p. D-2). Sasse, however, disagrees on the premise that "The typical layout form of one inch margins and single-spacing has too much text on the page. In fact, the commonly accepted ratio of white space to text is 1:1" (2000, p. 34).

#### Academia & Science:

"[T]here is no one factor that acts independently to enhance readability" (1998, Conclusions section, para. 1), according to the results of Melissa Youngman and psychology professor at Stephen F. Austin State University in Texas Dr. Lauren Scharff's experiment to determine "how text width and margin width influence reaction time" (Youngman & Scharff, 1998, para. 4) for twenty-seven participants. However, while text width alone "does not influence readability...there was a significant

interaction between text width and margin width" (Youngman & Scharff, 1998, Conclusions section, para. 1).

Participants read most efficiently in two conditions: when text width was small (four inches) and margin width was large; or, when text width spanned the page (eight inches) and there was no border (Youngman & Scharff, 1998, Conclusions section, para. 1).

Jerry Greenfield, professor of English as a Foreign Language and Information Technology at Miyazaki International College in Japan, supports the above assertion that "margins have little or no effect on legibility and can be adjusted freely on the basis of aesthetic preference and practical considerations" (2000, Margins section, para. 1). He cautions writers against excessively text-heavy pages, however, advising them to allow "sufficient white space overall. This consideration together with optimal line width suggests allowing for generous margins even in web pages" (Greenfield, 2000, Margins section, para. 1).

Jacci Howard Bear, who teaches desktop publishing over the Internet, notes that margins should progressively increase in size "from smallest to largest: inside, top, outside, bottom" (Howard Bear, n.d., Margins #3 section, para. 1).

In documents with facing pages, "the outside margin of each page should be double the inside margin" (Howard Bear, n.d., Margins #1 section, para. 2), and the bottom tends to be largest (Howard Bear, n.d., Margins #1 section, para. 1).

Source Reliability: 8.9/10

#### Conclusion:

There seems to be no standard margin width that is applicable to all documents, and, so long as the writer appropriately applies the principles of white space and line length, the issue may be one of personal preference. The subject of optimal margin width so closely meshes with that of line length that it is difficult to separate the two. Analysts should therefore consider both issues – line length and margin width – when designing documents for user-friendly 'Packaging'.

**Analytic Confidence: 7.5/10** 

ule #21: Appropriate margin size is largely a matter of preference,

so long as writers apply appropriate line length and white space principles. (Strength: 8.2/10)

# **Spacing According To...**

### Style Manuals:

Alley et al. notes that the formats for engineering and science papers are much more detailed than the simplistic "double spaced and front side of the paper only" reports that everyone writes in grade school (2004, para. 2). "Why is that so? One reason is to make the reading process efficient" (Alley et al., 2004, para. 2).

12 pt = Single Spacing 15 pt = Optimum Spacing

24 pt = Double Spacing

Figure 8. Leading differs from the traditional singleand double-spacing and ensures optimum spacing between lines. Source: Sasse, 2000, Figure 7: Line Spacing using Leading section, p. 36.

NACAC desires writers double-space all of their text, "including references and quotations" (n.d., p. 2), while the USAMC utilizes single-spaced text within paragraphs and double-spacing between them (2003, p. E-2).

On a different track, Sasse bypasses the traditional single- or double-spaced text in favor of an optimum spacing called 'leading', which "is the amount of space between lines of text" (See Figure 8) (2000, Figure 7: Line Spacing using Leading section, p. 36). Sasse explains how to set leading on a word processor: from the format – paragraph box, set line spacing to "at least" and set the number at 15 – the optimum spacing for a 12-point font (2000, p. 36).

#### Academia & Science:

Based on their research that created a set of guidelines for tutors to follow to make online courses more accessible to dyslexic students, Blankfield, Davey and Sackville advocate greater than single-spaced line spacing. Specifically, regarding lists of hyperlinks, they recommend including "full line spacing between links to make them easy to read" (Blankfield et al., 2002, Course development section, p. 9).

As University of Sussex's Peter Rainger observes, "The space between lines is important [for dyslexics]. Research suggests a leading (space) of 1.5 to 2 times the space" (2003, Keep to left aligned, un-justified text section, p. 7). Moreover, writers should break up the text between paragraphs with line spacing (Rainger, 2003, Keep to left aligned, un-justified text section, p. 7).

From their research into universal design principles, Thompson, Johnstone and Thurlow found that increasing the leading to "25-30 percent of the point...size [provides] maximum readability" (Thompson et al., 2002, Leading section, para. 3) and "makes a document more readable for people with low vision" (Thompson et al., 2002, Leading

section, para. 2). Conversely, insufficient leading "makes type blurry and gives the text a muddy look" (Thompson et al., 2002, Leading section, para. 1). For maximal differences in readability, however, writers should manipulate "the interaction between point size, leading and line length", and not leading alone (Thompson et al., 2002, Leading section, para. 4).

"[O]ptimal line spacing varies with font size and line length", according to Robbins, but typically, leading for 12-point font, with 1-inch margins is "1 to 5 points larger than the type size" (2004, One Lead Or Two? section, pp. 123-4). This translates to leading that is "slightly larger than single spacing but not as large as 1.5 spacing" (Robbins, 2004, One Lead Or Two? section, p. 124). Leading is greater for 12-point Times New Roman, however; here, "optimal line leading is something slightly less than 1.5 spacing" (Robbins, 2004, Footnote 106, p. 129).

Writers should consider proximity when choosing spacing size. Proximity provides organization as placing things close together "denotes relationship whereas the opposite is true when items are spaced apart" (Robbins, 2004, Proximity: Keep Related Items Related In Layout section, p. 128). Employing too many spaces between text leads to more or longer fixation pauses, the pause that occurs when the reader moves from one piece of text to the next; too many pauses "create a more difficult document" (Robbins, 2004, Proximity: Keep Related Items Related In Layout section, p. 128). Too many spaces between a heading and the corresponding text, for example, will decrease the document's legibility (Robbins, 2004, Proximity: Keep Related Items Related In Layout section, p. 128).

Source Reliability: 9.17/10

### Conclusion:

Of the four style manuals that discuss line spacing, academia and science more fully support Sasse in opting not for a single- or double-spaced document, but for optimal line spacing called 'leading'. Appropriate leading depends on font size and line length, but for Times New Roman 12-point, is just under 1.5 spacing. When 'Packaging' products for their decisionmakers, it is important for analysts to take into consideration the factors that support optimal line leading – versus the clutter of single-spacing and the disorientation resulting from double-spacing.

**Analytic Confidence: 9/10** 



(Strength: 9.1/10)

# White Space According To...

### Style Manuals:

Manipulating white space is one way for writers to increase their document's readability (Sasse, 2000, p. 34). "[T]he commonly accepted ratio of white space to text is 1:1" (See

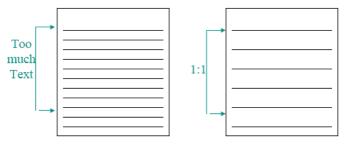


Figure 9. The ideal ratio of white space to text is 1:1. Source: Sasse, 2000, Figure 4: White Space to Text at 1:1 section, p. 35.

Figure 9), which contradicts the typical text-filled layout form of one-inch margins and single spacing (Sasse, 2000, p. 34).

As another formatting tip, Sasse notes writers should "use white space to give distinction to headings" and should leave "more space above a heading than below it" (2000, p. 38).

#### Academia & Science:

Miguel A. Cortes, a graduate student at San Diego State University, observes that when used properly, white space "gives web pages a clean, organized appearance, making them easy to scan" (Cortes, n.d., Spatial section, para. 1).

Thompson, Johnstone and Thurlow's research into principles of universal design found that blank space (or, white space) "anchors text on the paper" (Thompson et al., 2002, Blank Space section, para. 2) and "helps increase legibility" (Thompson, Johnstone, & Thurlow, 2002, Blank Space section, para. 3). "A general rule is to allow text to occupy only about half of a page" (Thompson et al., 2002, Blank Space section, para. 4).

Designing page layout with dyslexia in mind also supports the idea of having at least fifty percent white space. "'Designers should reduce overall information density to less than 50 percent of the screen area'... It is helpful to provide sufficient 'white space' to

guide the reader from one point to another and allow time for the material to be absorbed" (Rainger, 2003, Page design issues section, p. 5).

Ruth Anne Robbins of Rutgers further supports "The 50% rule" of balanced white space, as it affects legibility and is more visually appealing than papers with a greater amount of text (2004, p. 124). A legibility study by Drs Miles A. Tinker and Donald G. Paterson of over nine-hundred college students revealed that 89 percent agreed with the 50 percent white space rule "for legibility and aesthetic reasons" (2004, p. 124). Those who disagreed did so out of concern for wasted paper (2004, p. 124). Robbins adds, "According to one expert in adult learning theory, a pleasing amount of white space does not actually affect legibility, 'but the reader *thinks* it does" (2004, p. 124).

Source Reliability: 7.5/10

#### Conclusion:

White space is an important feature of document design, as style manuals correctly point out. Adequate white space – about fifty percent – makes documents look clean, makes them easy to scan, increases legibility, helps guide the reader, and allows them time to absorb the information. The fifty percent white space rule is perhaps best to follow as it ensures the document will appeal to the majority of the population; that is, it is inherently more legible for dyslexics and individuals with learning disabilities. White space is an important concept, as an explicit part of the 'Packaging' maxim. It also implicitly contributes to 'Concision' by forcing analysts to wrestle with a smaller form; that is, they have less room for actual text when exactly half of the document is... nothing.

**Analytic Confidence: 8.5/10** 

ule #23: Documents should have a 50:50 ratio of text to white

space. (Strength: 8/10)

# Conclusion: A 14-Step Plan For Intelligence Analysts

So, what does all this mean?

The first section, a study of 41 intelligence decisionmakers, produced a set of 14 maxims for analysts to follow, based on what decisionmakers say they want.

This last section dissected seven style manuals, supported (or opposed) their guidance with research from academia, science and expert opinion, and resulted in 23 weighted rules that analysts should abide by.

As decisionmakers are the reason for the product, their opinions are most important. For that reason, the maxims carry much more weight than do the rules, and these maxims are what analysts should implement above all.

But, how to do this? And, where do the rules fit in?

First, there is no rule that does not fit with a maxim, either explicitly or implicitly. In fact, some rules support more than one maxim. The rules, then, become the actions that analysts can take to implement a maxim. For example, to address decisionmakers' desire for 'Unbiased', honest intelligence, analysts can follow Rule #5 (present data accurately and in its entire, un-manipulated form) and Rule #6 (signed documents, proper sourcing, and adherence to design principles establishes author credibility and responsibility).

There exist, however, cases where a maxim has no rule to support it. This does not mean that the maxim is unimportant, nor does it mean that the style manuals are wrong in not addressing these maxims (although, in the future, perhaps they should). It simply means that some things decisionmakers want did not make it into style manuals, perhaps because such things are common sense, or perhaps because such things transcend 'writing' guidelines. For instance, not a single rule derived from the style manuals corresponds with the decisionmaker maxim for 'Close Relationships' between the analyst and decisionmaker. However, as the first section demonstrated, this subject is very important to decisionmakers, as well as to an accurate intelligence process – especially when the close relationship helps define and *refine* the product's criteria.

Another issue absent from style manuals is timeliness. Yet how can this be?! More than one (indeed, 13) decisionmaker asserted that intelligence is worthless if not delivered in a timely manner.

With such instances in mind, it is important to stress and make clear to the reader that *every* maxim is important, perhaps equally so. An analyst can produce the most

brilliant, informed, clear, concise, tailored, and user-friendly report, but if they disregard the 'Timeliness' maxim, they are in the wrong business. 16

Does that put 'Decisionmaker-focused' (with 27 decisionmakers supporting it) and 'Informality' (with three decisionmakers supporting it) on the same level of importance? Almost certainly not. An exact ranking of importance for the 14 maxims is beyond the scope of this thesis and, to be valid and universally applicable would require input from each US intelligence decisionmaker. For now, it is enough to say every maxim is important and analysts would do very well to abide by the set in its entirety.

Below, then, are the 14 maxims, in the order in which they appeared in the first section, followed, where applicable by the corresponding rules.

Note: Rules with an asterisk (\*) are explicit in the maxim; rules without an asterisk are implicitly implied. All rules are presented in numerical order, and do not appear according to their strength.

### Holistic

### Maxim #1: Options

15 decisionmakers want the full range of options and opportunities.

#### Maxim #2: Unbiased

15 decisionmakers want unbiased, honest, and complete intelligence products.

\*Rule #5: Present data accurately and in its entire, un-manipulated form. (Strength: 8.95/10)

### Maxim #3: Accuracy

13 decisionmakers want accurate intelligence.

- Rule #4: Ensure correct spelling. (Strength: 9.1/10)
- \*Rule #5: Present data accurately and in its entire, un-manipulated form. (Strength: 8.95/10)

<sup>&</sup>lt;sup>16</sup>Interestingly, Major Dan Ward, USAF said almost exactly the same thing in his article, *The Findability Quotient: Making Intel Accessible*, presented to the 2005 International Conference on Intelligence Analysis on May 3, 2005 (after this author wrote this Conclusion). "An intel analyst may craft the most insightful products, perform the most comprehensive analysis and generate petabytes of data, but if the actual customer is not able to get access to it in a timely manner, *the analyst has done nothing*" (Introduction section, para. 1).

- \*Rule #6: Signed documents, proper sourcing, and adherence to design principles establishes author credibility and responsibility. (Strength: 7.7/10)
- Rule #11: Tailor content and style to the reader. (Strength: 9.75/10)

# Maxim #4: Accountability

8 decisionmakers want analysts to bear personal responsibility.

- \*Rule #6: Signed documents, proper sourcing, and adherence to design principles establishes author credibility and responsibility. (Strength: 7.7/10)
- Rule #9: Write clearly, using simple words, and avoiding jargon. (Strength: 8.5/10)

# **User-Friendly**

# Maxim #5: Packaging

13 decisionmakers want attractive, user-friendly packaging.

- Rule #3: Use the active voice at all times in intelligence documents. (Score: 7.85/10)
- Rule #4: Ensure correct spelling. (Strength: 9.1/10)
- \*Rule #7: Put the bottom line up front. (Strength: 9.25/10)
- \*Rule #8: Be concise. (Strength: 9.5/10)
- Rule #9: Write clearly, using simple words, and avoiding jargon. (Strength: 8.5/10)
- \*Rule #10: Be consistent with layout, grammar and writing style. (Strength: 8.6/10)
- \*Rule #11: Tailor content and style to the reader. (Strength: 9.75/10)
- \*Rule #12: Make documents scannable, accessible and user-friendly. (Strength: 9.1/10)
- \*Rule #13: Use a hierarchical heading structure. (Strength: 8.15/10)
- \*Rule #14: Use powerful, meaningful and enticing headlines. (Strength: 10/10)
- \*Rule #16: Serifs for body text, sans serifs for headings and on-screen, and 12-point default size. (Strength: 8.6/10)
- \*Rule #17: Bold for headings, italics for emphasis, underline for hyperlinks only, and all caps never. (Strength: 9.13/10)
- \*Rule #18: Properly done, graphics add significantly to text. (Strength: 9.1/10)
- Rule #19: Use left-justified text. (Strength: 9.45/10)
- Rule #20: Optimal line length equals forty to seventy characters (eight to ten words) per line. (Strength: 8.85/10)
- Rule #21: Appropriate margin size is largely a matter of preference, so long as writers apply appropriate line length and white space principles. (Strength: 8.2/10)

- Rule #22: Use 'leading' instead of single- or double-spacing. (Strength: 9.1/10)
- \*Rule #23: Documents should have a 50:50 ratio of text to white space. (Strength: 8/10)

### Maxim #6: BLUF

8 decisionmakers want the bottom line up front.

- \*Rule #7: Put the bottom line up front. (Strength: 9.25/10)
- Rule #12: Make documents scannable, accessible and user-friendly. (Strength: 9.1/10)
- \*Rule #13: Use a hierarchical heading structure. (Strength: 8.15/10)
- \*Rule #14: Use powerful, meaningful and enticing headlines. (Strength: 10/10)
- Rule #18: Properly done, graphics add significantly to text. (Strength: 9.1/10)

# Maxim #7: Clarity

21 decisionmakers want clear and straightforward words.

- \*Rule #1: Spell out acronyms on first use or avoid altogether. (Strength: 6.85/10)
- \*Rule #2: Proper grammar matters. (Strength: 8.85/10)
- \*Rule #3: Use the active voice at all times in intelligence documents. (Score: 7.85/10)
- \*Rule #4: Ensure correct spelling. (Strength: 9.1/10)
- Rule #8: Be concise. (Strength: 9.5/10)
- \*Rule #9: Write clearly, using simple words, and avoiding jargon. (Strength: 8.5/10)
- Rule #16: Serifs for body text, sans serifs for headings and on-screen, and 12-point default size. (Strength: 8.6/10)
- Rule #17: Bold for headings, italics for emphasis, underline for hyperlinks only, and all caps never. (Strength: 9.13/10)
- Rule #18: Properly done, graphics add significantly to text. (Strength: 9.1/10)

### Maxim #8: Concision

13 decisionmakers want writing to be concise.

- \*Rule #8: Be concise. (Strength: 9.5/10)
- Rule #18: Properly done, graphics add significantly to text. (Strength: 9.1/10)
- Rule #23: Documents should have a 50:50 ratio of text to white space. (Strength: 8/10)

### Maxim #9: Consistency

8 decisionmakers want some form of standardized terminology.

• \*Rule #10: Be consistent with layout, grammar and writing style. (Strength: 8.6/10)

### Maxim #10: Timeliness

13 decisionmakers want timely intelligence.

# **Based On The Decisionmaker's Needs And Wants**

### Maxim #11: Decisionmaker-focused

27 decisionmakers want products to be tailored to their needs.

- \*Rule #11: Tailor content and style to the reader. (Strength: 9.75/10)
- \*Rule #15: Tailor format to the message and audience. (Strength: 9.25/10)
- Rule #16: Serifs for body text, sans serifs for headings and on-screen, and 12-point default size. (Strength: 8.6/10)

# Maxim #12: Close Relationships

13 decisionmakers want close relationships with their analysts.

### Maxim #13: Novelty

7 decisionmakers are well informed on intelligence matters.

# Maxim #14: Informality

3 decisionmakers want a shift toward informal, real-time analytic insights.

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# Section Three: Applying Decisionmaker Maxims To Intelligence Documents

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### Introduction

The previous two sections uncovered a set of 14 maxims that decisionmakers want from their analysts, as well as 23 rules, supported by academia, science and expert opinion, that analysts can implement to help achieve an optimal level of communication. The next step is to test the hypothesis that these maxims and rules actually apply to the intelligence field, and to attempt to determine exactly what features of notable failed intelligence documents precluded their success. Section Three therefore examines the documents that contributed to three US intelligence failures: Vietnam, Yugoslavia and September 11, 2001.

# The September 11, 1967 Vietnam Memorandum: *Implications Of An Unfavorable Outcome In Vietnam*

Throughout the 1960s, the Office of National Estimates (ONE) had a number of intelligence successes regarding its analyses on the Vietnam War. At least some estimates from 1965 were "on target", according to Lloyd C. Gardner, the Vietnam War specialist who wrote the Introduction to the National Intelligence Council's release of period intelligence (2005, Years of Escalation section, para. 7). One document however was a clear failure.

In 1967, Director of Central Intelligence (DCI) Richard Helms commissioned a Memorandum, *Implications Of An Unfavorable Outcome In Vietnam* (See Annex 5 to view pages 1-4), to address the domino thesis, which compared Southeast Asia's situation to a row of dominoes. Here, the US would lose "raw materials and people as country after country toppled over behind the 'Bamboo Curtain.' [The theory] stressed Japan's still shaky economic place in the 'free world.' Japan was the last domino; when the others fell, that vital Asian nation would also pitch over 'toward the Communist areas in order to live'" (Gardner, 2005, The First Indochina War section, para. 16).

Helms' memo, which proposed a wide range of possible outcomes in line with this theory, was so top secret that he delivered it to US President Lyndon B. Johnson in a sealed envelope with a warning that the "mere rumor that such a document existed... would in itself have been political dynamite" (Gardner, 2005, Years of Escalation section, para. 18). Gardner notes, "Helms's 'secret' memo to Johnson apparently remained a deep secret. Robert S. McNamara writes that he did not see it until after he left office and returned to the Johnson Presidential Library to do research for his memoirs" (2005, Years of Escalation section, para. 20). The writing and content in the memo was such that Johnson likely dismissed it, and certainly did not share or act on it.

In the late 1980s, the cohesive factors of "national pride, local economic aspirations, and historically antagonistic religious and cultural identifications" that held together (the former) Yugoslavia were crumbling (CIA, 1990, p. v). The single state, which encompassed the six republics of Bosnia-Herzegovina, Croatia, Macedonia, Montenegro, Slovenia, and Serbia and its two autonomous provinces, Kosovo and Vojvodina, since the late-1970s had faced increased "national and ethnic tensions…due to unequal development and a growing burden of debt" (BBC, n.d., 1945 section, para. 1), and now lacked the political will to remain together.

In 1990, some members of the United States (US) Intelligence Community (IC) recognized the impending trouble in Yugoslavia and drafted a National Intelligence Estimate (NIE) to warn decisionmakers of the issue. When *Yugoslavia Transformed* (herein known as the *Yugo NIE*) came out in October of that year, it had very little impact. This was partly because US decisionmakers directed most of their attention towards the Middle East, where Iraq had invaded Kuwait that summer. More importantly, the authors of the Yugo NIE robbed the document of its impact through ineffective communication techniques (See Annex 6 for the first seven pages of the document).

# The August 6, 2001 President's Daily Brief

The President's Daily Brief (PDB) is arguably the highest form of the analytic art. Designed to keep the President informed on a wide range of issues, the best analysts write it and senior leaders review it. Despite this, at the center of much controversy regarding the USIC is "the August 6 memo", or the PDB from August 6, 2001 that apparently informed US President George W. Bush that "[Osama] Bin Ladin [Is] Determined To Strike in [the] US" (See Annex 7 for full text). Not knowing much about writing for intelligence, one would likely be convinced that the memo should have felt like a bucket of cold water to the President, and indeed, the controversy spawns from the fact that it did not.

For example, besides the warning in the headline, the text told President Bush that:

- "Bin Ladin since 1997 has wanted to conduct terrorist attacks in the US" (CIA, 2001, para. 1);
- "Bin Ladin implied...that his followers would 'bring the fighting to America'" (CIA, 2001, para. 1);
- Bin Ladin's "attacks against...US embassies...in 1998 demonstrate that he prepares operations years in advance and is not deterred by setbacks" (CIA, 2001, para. 6);
- "FBI information...indicates patterns of suspicious activity in this country consistent with preparations for hijackings or other types of attacks" (CIA, 2001, para. 10);

• "a call to [the US] Embassy in the UAE in May [said] that a group of Bin Ladin supporters was in the US planning attacks with explosives" (CIA, 2001, para. 11).

Anyone with a critical eye for proper – that is, effective – intelligence writing, however, would have seen a different story, one that essentially reads, "tell me something I don't know".

That a "tell me something I don't know" type of document dared show itself on the President's desk, then, is much of the problem with the USIC: after having gone through several layers of bureaucratic "butt-covering", this PDB was the best writing and estimate available to the most powerful man in the world.

### Conclusion

These are characteristic – some might say quintessential – products emanating from the USIC. Moreover, they come from roughly the same time period as the decisionmakers cited in Chapter 4: Section One and roughly the same time period covered by a variety of commissions designed to improve intelligence (see Case Study, Chapter 4: Section One). Within the context of history, all of these documents proved to be failures.

This thesis, however, is not about history. It is about communication. The question that remains to be answered then is, how much of this failure can be attributed to a failure to communicate and can the maxims and rules developed in previous sections (accounting, of course, for the differences in available technology) help determine why these failures occurred?

### **Holistic**

# axim #1: Options

15 decisionmakers want the full range of options and opportunities.

### **Vietnam Memo: Yes**

The entire point of the Vietnam Memo was to provide the decisionmaker with the full scope of possibilities regarding an "unfavorable outcome". The range of these that the analysts considered and presented was sufficient in depth and breadth to adhere to Maxim #1. The issue with this document, however, arises in that these "possibilities" were unclear (see Maxim #7 for more information) and useless to their decisionmaker.

### Yugo NIE: No

The Central Intelligence Agency's (CIA) greatest failure in the October 1990 National Intelligence Estimate (NIE) *Yugoslavia Transformed* (herein known as *Yugo NIE*) was that they gave their decisionmakers no options whatsoever.

The first page read like this:

- "Yugoslavia will cease to function as a federal state within one year, and will probably dissolve within two. Economic reform will not stave off the breakup" (1990, p. iii); and
- "There is little the United States and its European allies can do to preserve Yugoslav unity. Yugoslavs will see such efforts as contradictory to advocacy of democracy and self-determination" (1990, p. iii).

The document's bottom line up front, then, told United States (US) decisionmakers: it is certain that Yugoslavia will dissolve; there is nothing that you or your friends can do about it; and the locals do not want your help.

Further, no one else, according to the Yugo NIE, could do anything about the impending doom – not the Soviets, not the Europeans and not Yugoslavia itself:

• "The Soviet Union will have only an indirect influence...on the outcome in Yugoslavia.... The Europeans have some leverage, but they are not going to use it to hold the old Yugoslavia together" (p. vi)

• "Neither the Communist Party nor the Yugoslav National Army (JNA) will be able to hold the federation together. The party is in a shambles; the army has lost prestige.... Alternatives to dissolution now being discussed in various quarters are unlikely to succeed" (p. v).

At the time the Yugo NIE came out, US decisionmakers had other things on their minds; things that they could do something about. Iraq had just invaded Kuwait in August of that year, and most intelligence attention focused on the Middle East.

This more vital problem, coupled with the fact that the CIA failed to provide decisionmakers with any room to maneuver in, gave the latter little incentive to act. Apparently, things would happen with or without US intervention, so why bother?

### PDB: No

Nowhere in the August 6, 2001 President's Daily Brief (PDB) (herein known as *PDB*) did its authors satisfy the conditions of Maxim #1.

The PDB was "a summary containing 'generalized information about hijacking and any number of other things", according to White House press secretary Ari Fleischer (Woodward & Eggen, 2002, para. 26). Hijackings "were a minor part of the analysis, officials said" (Woodward & Eggen, 2002, para. 27). For example, the memo only briefly mentioned *unconfirmed* information from British intelligence in 1998, showing al Qaeda considered hijacking an airplane to negotiate the release of an imprisoned Muslim cleric – who, coincidentally, was convicted of "plotting to blow up New York City landmarks" (Woodward & Eggen, 2002, para. 28).

Further, the PDB lacked the imagination and insight that could have given the President alternative options or information. While Condoleeza Rice and other officials in the Bush administration asserted that US intelligence analysts could never "have predicted that these people...would try to use an airplane as a missile" (Woodward & Eggen, 2002, para. 16), a 1999 National Intelligence Council report "warned that terrorists associated with bin Laden might hijack an airplane and crash it" into US government buildings in Washington (Woodward & Eggen, 2002, para. 17). The report cites a 1995 al Qaeda plan to hijack and crash "a dozen US airliners in the South Pacific", as well as other "well-known case studies of similar plots" (Woodward & Eggen, 2002, para. 18).

# axim #2: Unbiased

15 decisionmakers want unbiased, honest, and complete intelligence products.

### Vietnam Memo: No Data

As the Vietnam Memo completely lacks facts, sourcing, author information, or any evidence with which to evaluate the authors' bias, there is insufficient data on which to evaluate this document against Maxim #2.

# Yugo NIE: Yes

While the tone of the Yugo NIE comes across as overly pessimistic, the argument is with the authors' analysis and not their listing of facts, which is free from obvious bias.

### **PDB: Partially**

While the PDB is not guilty of any overt bias in the facts presented, the document did not include all information available at the time. This violates Rule # 5 (present data accurately and in its entire, un-manipulated form), an essential component of this maxim. For example, a July 2001 Federal Bureau of Investigation (FBI) memo warned that Bin Ladin's terrorists could be training at US flight schools (Woodward & Eggen, 2002, para. 7), suggested they "might be planning to hijack US airliners" (Woodward & Eggen, 2002, para. 4), and proposed "a nationwide canvass for Middle Eastern aviation students" (Woodward & Eggen, 2002, para. 7). The CIA apparently received this memo only in 2002.

# axim #3: Accuracy

13 decisionmakers want accurate intelligence.

### Vietnam Memo: Partially

First, the Vietnam Memo was incorrect when it judged a political-military collapse, involving either the withdrawal of US forces or "sweeping political concessions", to be an "entirely implausible hypothesis" (ONE, 1967, p. 395).

Second, President Johnson was able to tear apart the Memo's hypotheses by leading National Security Adviser Walt Rostow through a question and answer series:

"Turning to the National Security Adviser, the President asked him to summarize the consequences of pulling out of Vietnam. Rostow gave the domino thesis a new spin by suggesting the first reaction would be "an immediate and profound political crisis," not in Vietnam, but in the United States. Out of this turmoil, he argued, the forces behind a "powerful isolationism" would emerge triumphant. Johnson then led him on to a further conclusion: "They would say our character had worn out?" Rostow replied, "Yes." And while we were divided and preoccupied by the debilitating debate, the USSR and China would seize dangerous initiatives. NATO "could never hold up" as America pursued its lost self-confidence. On and on he continued this litany of disasters, countering any and all arguments advanced in the [Vietnam] memo" (Gardner, 2005, para. 21).

Third, the analysts concluded their memo by commenting, "If the analysis here advances the discussion at all, it is in the direction of suggesting" that the risks of a bad outcome likely are more limited and controllable than most previous arguments indicate (ONE, 1967, p. 426). As the Vietnam War dragged on for eight years after the ONE produced the Vietnam Memo in 1967, one can hardly imagine a *less* limited and controllable outcome.

On the other hand, the Vietnam Memo did raise the notion that the US

"cannot crush a revolutionary movement which is sufficiently large, dedicated, competent, and well-supported.... In a narrow sense, this means more simply that the structure of US military power is ill-suited to cope with guerrilla warfare waged by a determined, resourceful, and politically astute opponent" (ONE, 1967, p. 7).

These statements, which the analysts mentioned only briefly, track well with the actual outcome of the war and the US's assumptions that it could wear down the guerillas over time.

# Yugo NIE: No

The CIA got both the product and process wrong when they wrote the Yugo NIE. First, while much of the information is indeed in-depth and the authors are clearly knowledgeable, their judgments are inaccurate and inappropriate. The authors' writing that an event "will" happen, that a population "will" view certain efforts a particular way, that not only "will" a conflict occur, but that it "will" last a period of time and

"will" take on certain characteristics, parallels fortune telling. Not only does the Yugo NIE predict an event with absolute certainty, but also it describes its depth and breadth. This goes against both Maxim #3 and Rule #5 (present data accurately and in its entire, un-manipulated form).

As the US decisionmakers paid little or no attention to the document, it is hard to believe that they were involved in the process and the analysts asked – and answered – the right questions.

#### PDB: No

Both the PDB's product and process went against Maxim #3. Regarding the former, the authors either lacked or chose to withhold "a vast, deep knowledge" of their subject, as they did not put current events into historical context. In fact, the analysts did not *analyze* at all; they simply wrote related facts down and left it for the President to determine what they meant. From this, there was no argument to support, and no reasoning or assumptions to make transparent.



8 decisionmakers want analysts to bear personal responsibility.

### Vietnam Memo: No

The Vietnam Memo's authors left nothing for which the Intelligence Community may hold them accountable. There is not a single source, citation or observable piece of evidence or fact within the entire document. Nor are there clear estimates; any estimate they do make they partially rescind, using alternate possibilities and caveats. Lastly, and most importantly, not one contributing analyst attached their name to the document, let alone signed it.

# Yugo NIE: No

The Yugo NIE contains not a single source, citation or personal reference by the authors. Not one of the authors signed the document, let alone attached their name to it. The only identifying factor, on the cover page, is the statement that the document "represents the views of the Director of Central Intelligence with the advice and assistance of the US Intelligence Community" (CIA, 1990).

PDB: No

There is controversy regarding whom actually to hold accountable for some information in the PDB, stemming from the following statement:

"Nevertheless, FBI information since that time indicates patterns of suspicious activity in this country consistent with preparations for hijackings or other types of attacks, including recent surveillance of federal buildings in New York" (CIA, 2001, 14).

Apparently, the government does not even know who all contributed to the PDB. "Some sources familiar with the [PDB] told *The Washington Post...* that the FBI added the notion of hijackings to the document, and that it had not included such references in early drafts" (Woodward & Eggen, 2002, para. 29). Conversely, other senior US officials said that the FBI never looked at the CIA-prepared report, and another source claims the memo is incorrect "in citing the FBI as providing information related to hijackings" (Woodward & Eggen, 2002, para. 30).

While the analysts revealed some of their sources to the best extent possible in a discipline that must keep these sources protected, this does not nullify the need for clear sourcing. The PDB's authors did not include any citations, however, that would have allowed the President to verify the data, and would have added to the document's credibility. Neither did they indicate the reliability of their sources or sign the document.

# **User-Friendly**

# axim #5: Packaging

13 decisionmakers want attractive, user-friendly packaging.

### Vietnam Memo: N/A

The resources available to the analysts that wrote the Vietnam Memo were minimal. It is not possible to review this document according to modern design standards and Maxim #5: Packaging is therefore not applicable.

# Yugo NIE: Partially

The Yugo NIE's packaging contains many elements that satisfy Maxim #5 and overall it is effective. The authors organized the estimate with a succinct bottom line up front (Rule #7) in the form of four bullet points. A map of Yugoslavia and its surrounding states followed this, and a one and a half page Key Judgments section, which provided the reader with a more detailed version of the four BLUFs, came next. After a Table of Contents, the authors launched into the bulk of the document – an in-depth discussion of the situation in Yugoslavia.

Sprinkled throughout the Yugo NIE are photographs of key people the authors mention and assorted graphics (Rule #18), text boxes explaining deviations from the text, and more bulleted lists (Rule #12). Decisionmakers also have available to them an Annex outlining Yugoslavia's demographics.

The authors of the Yugo NIE did not take into account two factors, however: proper font use and the 50:50 white space to text principle. They italicized all data in the Yugo NIE's six text boxes (which together span about four pages), decreasing readability in these spots (Rule #17). Additionally, the document is single-spaced and the analysts packed the text very densely (Rule #22 and Rule #23). Put together, the authors did not design the Yugo NIE for easy reading.

#### PDB: No

The PDB has two major packaging failures: the font is not conducive to optimal readability and the document is not accessible.

On the first point, it is highly likely that President Bush reads the PDBs from paper, versus a screen, and yet the font for the August 6, 2001 PDB is a sans serif, 10-point. As such, the PDB defies Rule #16, which requires serifs for body text (and paper), sans serifs for headings and on-screen, and recommends a 12-point default size.

The analysts further diminished the content's readability by italicizing entire sentences (Rule #17), which as the academics, scientists and experts made clear in Chapter 4: Section Two decreases legibility (the whole point behind using a sans serif) and slows reading speed by 4.5 percent in general, and up to 10 percent with small font and poor lighting. Ten-point type is borderline "small font", though still acceptable in sans serif.

On the second point, many factors contribute to the document's lack of accessibility, but the thread that ties these all together is its lack of a BLUF. From this, the PDB lacks a hierarchical heading structure (Rule #13), powerful headlines (Rule #14) and systematic organization.

Without a bottom line up front to serve as a cue, it is actually difficult to determine any sense of organization in the PDB. Its authors did not order their evidence in order of importance (if they did, this is unclear), nor did they order it chronologically (it jumps around from 1997 to 1998 to 1999 to 1998 to 1993 to 1997 to the mid-1990s and eventually up to May 2001). The organization, if there was any, is blurry.



8 decisionmakers want the bottom line up front.

### Vietnam Memo: No

Most obviously, the authors' bottom line for the Vietnam Memo is at the bottom – that is, in the Conclusion section at the end of the 33-page document. As such, it goes against both Maxim #6 and Rule #7 (put the bottom line up front).

For example, President Johnson would have had to sift through to page 20 just to find out what would be "the most important determinants for Asian attitudes" (ONE, 1967, p. 413). (Consequently, it was the manner in which the US defined its future role in Asia and the extent to which these plans appeared to "command political support" in the US [ONE, 1967, p. 413].)

Throughout the document, the authors consistently put the bottom line at the bottom, or bury it within the text – and within unclear writing, and make the BLUF difficult to find.

# Yugo NIE: Yes

The authors of the Yugo NIE successfully put their bottom line up front (Rule #7) in a number of ways:

- in a four-point summary on the first page;
- in an expansion of this, the Key Judgments section; and
- with effective topic sentences that open each paragraph.

The controversy over this document stems, however, from the fact that the estimative BLUFs were essentially useless.

### PDB: No

The analysts that wrote the PDB jumbled the information so much that there appears to be no bottom line, let alone one that they kindly put up front (Rule #7). Part of the problem here is with the authors' use of waffle words, like "may" and "apparently". For more detail on this point, see Maxim #9 (consistency).



21 decisionmakers want clear and straightforward words.

### Vietnam Memo: No

The Vietnam Memo's authors employed an overly formal, roundabout and unclear writing style that is difficult to follow and understand. The formality breaks Rule #9 (write clearly, using simple words, and avoiding jargon). For example, the first paragraph below belongs to the Memo, while the second is this author's translation:

"Insofar as the broader repercussions of this development are concerned, a critical variable would be the time the process took. If it took 10 years, obviously the significance of US acceptance of such a settlement would tend to be lost in the new context produced by interim

events. We are assuming for purposes of this discussion that the period would be short enough to make it impossible to blur the fact that American policy had met with a serious reverse; it would appear in fact that the US had deliberately accepted a faulty settlement rather than pay the price of trying longer to avert it" (ONE, 1967, p. 396).

Time is a critical factor to the broader consequences [previously mentioned]. If it takes ten years to achieve the settlement, then no one would notice the significance of the US accepting it. We assume here that time will in fact be insufficient to hide the fact that American policy lost. Rather than paying the costs associated with trying longer to avert it, the US would instead come across as if it deliberately accepted a bad settlement.

In general, many parts of the memo lack clarity and openly violate the decisionmakers' demand for "straightforward" words. This statement, for example, is anything but straightforward:

"Thus we do not conclude that other states in Asia would inevitably fall under Communist control in the wake of Communist success in Vietnam.... If one or more states in Southeast Asia did in fact fall under Communist control, the outlook for these goals would be even dimmer; the region could be in a turbulent and regressive condition for a long time" (ONE, 1967, pp. 413-4).

The authors leave their reader asking the question, "Huh?"

### Yugo NIE: Yes

The Yugo NIE was extremely clear in both its message and in the way the authors wrote the document. Despite the controversy over its lack of options for the decisionmakers to consider, the authors wrote very well.

#### PDB: No

The analysts that wrote the PDB did not achieve 'clear and effective communication' as decisionmakers demand, nor did they 'convey their message clearly' as academics, scientists and experts desire.

Consider, for example, the very first sentence that President Bush would have read: "Clandestine, foreign government, and media reports indicate Bin Ladin since 1997 has wanted to conduct terrorist attacks in the US." What *exactly* does that mean – in *2001*? Bin Ladin may "want" many things, just as everybody surely "wants" something. What was the likelihood that Bin Ladin would actually *act on* his desire?

Consider also the following snippets from the PDB:

- Bin Ladin is "Determined To" (CIA, 2001, title);
- Bin Ladin "implied...that his followers would follow" (CIA, 2001, para. 1);
- Bin Ladin "was planning to" (CIA, 2001, para. 3);
- the 1999 millennium plotting "may have been part of" (CIA, 2001, para. 4);
- the group "apparently maintains" (CIA, 2001, para. 7);
- "We have not been able to corroborate some of the more sensational threat reporting" (CIA, 2001, para. 9); and
- "information since that time indicates patterns of suspicious activity" (CIA, 2001, para. 10).

Wording such as this consumes the PDB and renders much – if not all – of its meaning unclear.

# axim #8: Concision

13 decisionmakers want writing to be concise.

### Vietnam Memo: No

Had the analysts that wrote the Vietnam Memo followed Maxim #7 (clarity), their writing would almost certainly have been concise. As it did not, however, the document is unnecessarily long and drawn out (see Maxim #7 for an example). Despite that the Memo is only 33 pages – double-spaced, the sentences are anything but densely packed full of information (Rule #8, be concise), and add unnecessarily to the length. Consider again the example in Maxim #7. The first sentence, from the Vietnam Memo, is 57 words long:

We are assuming for purposes of this discussion that the period would be short enough to make it impossible to blur the fact that American policy had met with a serious reverse; it would appear in fact that the US had deliberately accepted a faulty settlement rather than pay the price of trying longer to avert it" (ONE, 1967, p. 396).

This sentence, this author's reinterpretation, is 44:

We assume here that time will in fact be insufficient to hide the fact that American policy lost. Rather than paying the costs associated with trying longer to avert it, the US would instead come across as if it deliberately accepted a bad settlement.

Rewriting the Vietnam Memo in accordance with Maxim #7 (clarity) would almost certainly place the document in favor of Maxim #8.

### Yugo NIE: Yes

Not including Annexes, the Yugo NIE was twelve pages long. The amount of information packed into these pages, however, is immense. In adherence with Rule #8 (be concise), the authors wrote very tight, concise and efficient sentences. They wasted not one word in this sentence, for example:

"In Slovenia, and to a lesser extent Croatia, the new nationalism is westward looking, democratic, and entrepreneurial; in Serbia, it is rooted in statist economics, military tradition, and a preference for strong central government led by a dynamic personality" (CIA, 1990, p. v).

Readers clearly understand the roots of nationalism in all of Slovenia, Croatia and Serbia. Moreover, the authors refrain from unnecessarily lengthening the sentence by spelling out Croatia's nationalistic tendencies; with a slight caveat, the analysts instead coupled it with Slovenia's.

### PDB: Yes

Both sentences and paragraphs in the PDB are short and to the point and are consistent with the efficient, 'densely packed' sentences that academia, science and experts demand from writers (Rule #8). The analysts that wrote the document refrained from repetitive statements and including extraneous data. The following two sentences, for example, are to-the-point and, while they flow together, their content does not overlap:

"The millennium plotting in Canada in 1999 may have been part of Bin Ladin's first serious attempt to implement a terrorist strike in the US. Convicted plotter Ahmed Ressam has told the FBI that he conceived the idea to attack Los Angeles International Airport himself, but that Bin Ladin lieutenant Abu Zubaydah encouraged him and helped facilitate the operation" (CIA, 2001, para. 4).

# axim #9: Consistency

8 decisionmakers want some form of standardized terminology.

### **Vietnam Memo: No**

The Vietnam Memo employs very few good words of estimative probability (See Annex 6 for partial text). When it does, however, caveats and alternate possibilities blur the meanings and estimates. Some of the common phrases rife within the document are:

- "Perhaps it could be argued that..." (ONE, 1967, p. 420);
- "It seems unlikely that...would" (ONE, 1967, p. 410)
- "...would be by all odds..." (ONE, 1967, p. 413)
- "We think there is some chance that the Soviets would wish to..." (ONE, 1967, p. 416)
- "We assume..." (ONE, 1967, pp. 395-6)
- "In view of the present internal turmoil in China, it is impossible to say whether and in what degree it will be a significant factor in Asian power alignments during the next few years" (ONE, 1967, p. 409).

*It is impossible to say* from this block of text exactly what the authors' estimate was regarding Japan's likely actions:

"For the Japanese, however, the relationship with the US would be weighted primarily against the long-term threat posed by a nuclear China, and if developments in China did not seem likely to promise a diminution of this threat, Japan would probably want to preserve its present ties with the US. But the alternative of seeking security by becoming a nuclear power herself would probably also gain wider support" (ONE, 1967, p. 412) (emphasis added).

In the authors' purpose statement, they claim their goal is "to provide some greater precision about the probable costs...of an unfavorable outcome in Vietnam" (ONE, 1967, p. 394). It seems unlikely that they achieved their stated goal.

# Yugo NIE: Yes

The authors of the Yugo NIE successfully and in a consistent manner employed words of estimative probability (Rule #10: be consistent with layout, grammar and writing style). The words they chose, however, were inappropriate and expressed a level of confidence that no one with only five senses can be sure of.

The authors' writing that an event "will" happen, that a population "will" view certain efforts a particular way, that not only "will" a conflict occur, but that it "will" last a period of time and "will" take on certain characteristics, parallels fortune telling. Not only does the Yugo NIE predict an event with absolute certainty, but also it describes its depth and breadth. This goes against both Maxim #9 and Rule #5 (present data accurately and in its entire, un-manipulated form).

### PDB: No

The PDB was consistent in that it used *not one good word* of estimative language, and therefore violated Maxim #9. In the page and a half long document, a search for the words of estimative probability that actually convey some sense of probability – likely, unlikely, certain/certainly, probable/probably – turns up empty. The analysts left the President with only "waffle words" and "intelspeak" – "may" and "apparently".

# axim #10: Timeliness

13 decisionmakers want timely intelligence.

### Vietnam Memo: Yes

Its authors delivered the Vietnam Memo to President Johnson in a timely fashion.

# Yugo NIE: Yes

The Yugo NIE's authors gave their decisionmakers plenty of warning and time in which to try to affect change. The controversy surrounding this document, however, is that the analysts provided no opportunities or guidance as to what the US could possibly have done (see Maxim #1 for more information on Options).

### PDB: Yes

If anything, the August 6, 2001 PDB was timely in that it came before September 11, 2001. Further, it was timely in the sense that someone within the Intelligence Community considered the bin Ladin threat significant enough to push the matter in front of the President.

# Based on the decisionmaker's needs and wants

# axim #11: Decisionmaker-focused

27 decisionmakers want products to be tailored to their needs.

# **Vietnam Memo: Partially**

The Vietnam Memo was precisely what Director of Central Intelligence (DCI) Richard Helms asked for: a memorandum "that revisited the domino thesis one last time" (Gardner, 2005, Years of Escalation section, para. 18). However, it did not suit the needs of President Johnson: "it offered very little political help" (Gardner, 2005, Years of Escalation section, para. 20) for at least two reasons.

First, the process it proposed would work to Communist advantage, and quickly — within about a year; this did not suit the President's goals. Second, the memo admitted that it was impossible to separate this process from all interacting factors, and its conclusions were unclear. "It is hard to imagine Lyndon Johnson immersing himself for very long in the cloudy speculations the author had imposed on his conclusions" (Gardner, 2005, Years of Escalation section, para. 20).

# Yugo NIE: No Data

There is insufficient data with which to judge how well the Yugo NIE met its decisionmakers' needs. The best assessment is that, having not provided any options for the decisionmaker to act on, the analysts did not tailor the document to the former's needs.

### PDB: No

The analysts that wrote the PDB failed Maxim #11 – and simultaneously violated Rule #11 (tailor content and style to the reader) – simply because they did not fulfill President Bush's requirement.

The document "primarily focused on recounting al Qaeda's past efforts to attack and infiltrate the United States" (Woodward & Eggen, 2002, para. 1), when what the President specifically asked for was "an intelligence analysis of possible al Qaeda attacks within" the US (Woodward & Eggen, 2002, para. 3).

# axim #12: Close Relationships

13 decisionmakers want close relationships with their analysts.

### Vietnam Memo: Yes

The mere fact that the writer was able to put this in a sealed envelope a deliver a single copy to President Johnson implies an extremely close relationship between decisionmaker and analyst.

# Yugo NIE: No Data

There is insufficient evidence to assess this maxim for the Yugo NIE.

### **PDB: Not Applicable**

This maxim is not applicable to the PDB. There is good evidence, from former counterterrorism (CT) adviser on the US National Security Council Richard Clarke, that prior to September 11, 2001, President Bush did not want a close relationship with the CT analysts.

In an interview for the CBS news program *60 Minutes* for example, Clarke states of Bush, "He ignored it [the terrorist threat]. He ignored terrorism for months, when maybe we could have done something to stop 9/11" (CBS, 2004, para. 5). The administration "didn't take the threat seriously" (CBS, 2004, para. 27), and instead, "it was pushed back and back and back for months" (CBS, 2004, para. 27).

Clarke explains that he sought a Cabinet-level meeting to deal with what he viewed as an impending al Qaeda attack on January 24, 2001 – directly after President Bush's inauguration (CBS, 2004, para. 29). Despite his constant pushing, as well as warnings to Bush from Director of Central Intelligence George Tenet throughout "June, July, August" that "a major al Qaeda attack is going to happen against the United States somewhere in the world in the weeks and months ahead" (CBS, 2004, para. 38), the requested meeting took place only "one week prior to 9/11" (CBS, 2004, para. 43).

# axim #13: Novelty

7 decisionmakers are well informed on intelligence matters.

### Vietnam Memo: Yes

The purpose for the Vietnam Memo was to consider a variety of possibilities surrounding an outcome to the Vietnam War unfavorable to the US. It is likely that the authors managed to suggest some ideas that the decisionmaker had not previously considered.

### Yugo NIE: No

Many of the decisionmakers who read the Yugo NIE actually were very well informed on Eastern European affairs, so it is unlikely the document contained novel information. Take, for example, the President's contact for Yugoslavian affairs, the country's US Ambassador, and the Director of the National Security Council – Lawrence Eagleburger, Warren Zimmermann and Robert L. Hutchings, respectively.

Lawrence Eagleburger had a long-standing and high-level relationship with Yugoslavia As Deputy Secretary of State under US President George H.W. Bush, from 1989-92 he was the President's primary advisor for Yugoslavian affairs (Wikipedia, 2005, para. 5). Previously, he served in the US's Embassy in Yugoslavia from 1961-65 (Wikipedia, 2005, para. 2), and held the post of Ambassador to Yugoslavia from 1977-80 (Wikipedia, 2005, para. 4).

As of 1989, Yugoslavia's US Ambassador was Warren Zimmermann, a man who had spent over three decades serving as a Foreign Service Officer, largely throughout Europe, and "worked most extensively in Yugoslavia" (New School University, n.d., para. 2).

Further, the National Security Council Director at the time (1989-1992) was European specialist Robert L. Hutchings. Hutchings had "extensive experience in international relations and European affairs, including service as a special adviser to former U.S. Secretary of State James Baker III and as director of European affairs for the National Security Council" (Princeton University, 1997, para. 1). In the early 1980s, he also served as Deputy National Intelligence Officer for Europe (National Intelligence Council, n.d., Farewell to NIC Chairman section, para. 3).

#### PDB: No

If non-adherence to the decisionmaker's requirement counts as 'novelty', then the PDB's authors succeeded. This is not the case however, as President Bush was *not* well informed on the likelihood of possible al Qaeda attacks on the US.

Instead of providing new insights, the analysts used not a single creative thinking skill when they chose simply to report the details – thereby creating a document easily ignored by decisionmakers' standards.

# axim #14: Informality

3 decisionmakers want a shift toward informal, real-time analytic insights.

#### Vietnam Memo: Yes

While many of the technology-related delivery mechanisms that today contribute to an analyst's ability to provide their decisionmaker with informal intelligence were not available in 1967, in context, the Vietnam Memo did meet Maxim #14. That Richard Helms hand-delivered the document – in an envelope marked Top Secret and for President Johnson's eyes only – rates it as a largely informal, real-time piece of intelligence.

#### Yugo NIE: Not Applicable

By definition, the Yugo "National Intelligence Estimate" would not be an informal product. To have produced something informal and real-time would have been to strip the "NIE" from the title, and would have changed the document's structure and purpose.

#### **PDB: Not Applicable**

Similar to the Yugo NIE, the President's Daily Brief is an everyday and formal occurrence, a fact that precludes the authors choosing an alternate delivery mechanism. Had any questions from President Bush spawned from the PDB, the analysts then may have chosen to drift towards a less formal product.

#### Conclusion

Compiling and visualizing in a table (See Figure 10) all of the above data reveals some interesting insights about the documents and the maxims.

	Vietnam Memo	Yugo NIE	PDB
Holistic			
Maxim #1: Options	Y	N	N
Maxim #2: Unbiased	N/D	Y	P
Maxim #3: Accuracy	P	N	N
Maxim #4: Accountability	N	N	N
User-Friendly			
Maxim #5: Packaging	N/A	P	N
Maxim #6: BLUF	N	Y	N
Maxim #7: Clarity	N	Y	N
Maxim #8: Concision	N	Y	Y
Maxim #9: Consistency	N	Y	N
Maxim #10: Timeliness	Y	Y	Y
Based on the decisionmaker's needs and wants	3		
Maxim #11: Decisionmaker- focused	P	N/D	N
Maxim #12: Close Relationships	Y	N/D	N/A
Maxim #13: Novelty	Y	N	N
Maxim #14: Informality	Y	N/A	N/A
Legend: Y = Yes N = No P = P N/D = No Data	artially N/A =	Not Applic	able

Figure 10. Summarizing Section Three's findings reveals the strengths and weaknesses of each of the three intelligence documents.

#### The Documents

The Vietnam Memo had only three strong points: options, timeliness and novelty. While at least the first two characteristics – options and timeliness – may make an effective intelligence document in some cases, the Vietnam Memo's lack of clarity rendered it difficult to read, which also served to bury the bottom line, which in itself was inaccurate, vague and contradictory. The Memo was little more than opinion and jumbled speculation; far from being an effectively communicated intelligence analysis.

The Yugo NIE was very strong in its user-friendliness. The document was well written, clear, concise, and timely. Its major failing however was the complete lack of options it presented to the decisionmakers. Intelligence is useless if no one can act on it, a maxim the Yugo NIE proved quite clearly.

The PDB was timely and concise. Beyond that, it was a clear intelligence failure. The major reason for this is that its authors failed to do their job – analyze. The PDB lacked an estimate, a BLUF and a point, period. There was no obvious focus to the writing, nor was a clear hierarchy of importance evident in the packaging. Further, the authors failed to take into account very basic design principles: serifs for body text and paper, sans serifs for headings and on-screen. In doing this, they increased the President's workload, unnecessarily strained and fatigued his eyes and demanded more time of his morning in order to read the document. That the President declined to take seriously a terrorism threat only exacerbated the document's shortcomings.

#### The Maxims

Even a quick glance at Figure 10 reveals an interesting feature of the maxims: it can be difficult to evaluate intelligence documents according to those belonging to the category "Based on the decisionmaker's needs and wants". For example, while in one case it was apparent that the decisionmaker and analyst had a close relationship, in the others, such a relationship was either difficult to determine (Yugo NIE) or rejected by the decisionmaker (PDB). The latter case makes clear that Maxim #12 (close relationships) requires the participation of both parties and in some cases, will simply not apply. Also, Maxim #14 (informality) is more of a suggestion to analysts prior to writing, rather than a *post hoc* evaluation criteria. This maxim therefore did not apply in two of the three cases.

Next, the rules that fall under Maxim #5 (packaging) hardly apply to older documents as the tools analysts possessed even ten years ago were sparse compared to what is currently available.

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# Conclusion

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#### **Supportable And Partially Supportable Conclusions**

It seems likely that most, if not all of the maxims derived from Chapter 4: Section One are valid criteria for intelligence documents. Not only did they form as a direct result of decisionmakers' writings, they also successfully identified a failure to communicate as significant contributors to three United States (US) intelligence document failures.

Most heavily supported are the maxims for:

- decisionmaker-focused (Maxim #11, 27 decisionmakers);
- clarity (Maxim #7, 21 decisionmakers);
- options (Maxim #1, 15 decisionmakers);
- unbiased (Maxim #2, 15 decisionmakers);
- concision (Maxim #8, 13 decisionmakers);
- close relationships (Maxim #12, 13 decisionmakers);
- packaging (Maxim #5, 13 decisionmakers);
- timeliness (Maxim #10, 13 decisionmakers); and
- accuracy (Maxim #3, 13 decisionmakers).

Although this thesis surveyed 41 decisionmakers, considering that many focused on single issues or, in Law Enforcement's case, stressed pictures and brevity more than did Business or National Security, having "only" 13 decisionmakers overtly and clearly support a common premise is considerable. The same holds true for the remaining maxims.

The rules created in Chapter 4: Section Two are also strong and well founded. The section employed approximately seventy sources, whose reliability is clearly marked, and ranked in the top two-thirds of the scoring mechanism on all but two occasions. Also clearly marked is the level of analytic confidence in the final rules, which allows users to decide almost instantaneously the value and importance they should give to each. As noted earlier, analysts can use these rules, where appropriate, to address decisionmakers' demands.

#### **Recommended Research Topics**

Chapter 2 noted that this thesis confines itself to surveying a limited number of decisionmakers and examining a finite number of style manuals and design principles. Expanding the scope of this research would be an excellent area for further study.

Another valuable study would either incorporate alternative communication styles and mechanisms, such as the optimal approach to non-written communications like inperson briefings, presentations, or unplanned meetings, or delve more deeply into the communication styles already studied – that is, written and on-screen.

#### Personal Response To The Research

As this author was limited by time and "flow", it was impossible to include all observations and asides that rose out of the research. It is amazing just how much goes into "optimal communication", however, yet how simple it is to achieve it. Creating a ready-made template for form and a software editor that catches such ideas as BLUF, brevity, clarity, consistent words of estimative probability, and the factors contributing to accountability (author name, sources, analytic confidence, and source reliability, for example) instantly and *effortlessly* produces a highly effective document – regardless of the content. Consider this: if the bottom line is briefly and clearly up front, the reader will spend less than a minute (arguably less than ten seconds) scanning that first line and determining whether to read further or not. It is that simple – and infinitely useful.

What is more, it was so clear after reading only five, ten, fifteen decisionmakers that they are each begging for much the same things. They beseech their analysts to listen. The tone of their calls for close relationships was almost desperate at times. It begs asking – has anyone else heard them? This is not to say that decisionmakers are innocent, nor does it let them off the hook for ignoring good intelligence or making bad policy. Nor are the analysts fully to blame, though they often fall victim to media hype. The message here is simple. In a time when two massive US intelligence failures (September 11, 2001 and WMDs in Iraq) have

- cost tens of thousands of lives,
- caused both fear and uproar among the US public,
- led to high-level resignations and "cabinet shuffling",
- led two investigative commissions to call on the IC for change,
- spawned the creation of two new intelligence offices (Department of Homeland Security and Office of the National Intelligence Director),
- resulted in *hundreds of billions* of dollars being diverted away from benefits for the average American, and
- raised the people of the US's level of awareness of the IC and its actions,

the US must stop blaming, stop spending, stop "shuffling", and start *communicating*. "Slam dunk" and "dead wrong" should be logical extremes – not synonyms.

## **Annexes**

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#### Annex 1: List Of 26 Style Manuals Available At Meriam Library

Style manuals (12 to choose from):

- Broadcast News Writing Stylebook (journalistic style) Papper, Robert A., 2nd ed., 2000 (Meriam Library, n.d., para. 2);
- The Bluebook: a Uniform System of Citation (legal citations) Harvard Law Review Association, 16th ed., 1999 (Meriam Library, n.d., para. 3);
- Chicago Manual of Style University of Chicago Press, 15th ed., 2003 (Meriam Library, n.d., para. 4);
- Form and Style: Research Papers, Reports, Theses Slade, Carole, 11th ed., 2000 (Meriam Library, n.d., para. 5);
- Manual for Writers of Term Papers, Theses and Dissertations Turabian, Kate
   L., 6th ed., 1996 (Meriam Library, n.d., para. 6);
- MLA Handbook for Writers of Research Papers Gibaldi, Joseph, 6th ed., 2003 (Meriam Library, n.d., para. 7);
- MLA Style Manual and Guide to Scholarly Publishing Gibaldi, Joseph, 2nd ed., 1998 (Meriam Library, n.d., para. 8);
- A Pocket Style Manual Hacker, Diana, 2nd ed., 1997 (Meriam Library, n.d., para. 9);
- Publication Manual of the American Psychological Association American Psychological Association, 5th ed., 2001 (Meriam Library, n.d., para. 10);
- Scientific Style and Format: The CBE Style Manual for Authors, Editors & Publishers, 6th ed., 1994 (Meriam Library, n.d., para. 11);
- The Columbia Guide to Online Style Walker, Janice R., 1st ed., 1998 (Meriam Library, n.d., para. 12); and,
- Electronic Styles: A Handbook for Citing Electronic Information Li, Xia, 2nd ed., 1996 (Meriam Library, n.d., para. 13).

How to conduct research (six to choose from):

- Bookmarks: A Guide to Research and Writing Ruszkiewicz, John J., 2000;
- The Craft of Research Booth, Wayne C., 2nd ed., 2003 (Meriam Library, n.d., Conducting Research and Finding Information section, para. 1);
- Find it Fast: How to Uncover Expert Information on Any Subject Berkman, Robert I., 1994 (Meriam Library, n.d., Conducting Research and Finding Information section, para. 2);
- The Research Process: Books and Beyond Bolner, Myrtle S., 1997 (Meriam Library, n.d., Conducting Research and Finding Information section, para. 3);

- Research Writing Using Traditional and Electronic Sources Joseph, Nancy L., 1999 (Meriam Library, n.d., Conducting Research and Finding Information section, para. 4); and,
- The Writer's Ultimate Research Guide Metter, Ellen, 1995 (Meriam Library, n.d., Conducting Research and Finding Information section, para. 6).

#### How to write term papers (ten resources to choose from):

- How to Write and Publish a Scientific Paper Day, Robert A., 5th ed., 1998 (Meriam Library, n.d., Writing Term Papers section, para. 1);
- How to Write Term Papers & Reports Baugh, L. Sue, 2nd ed., 1997 (Meriam Library, n.d., Writing Term Papers section, para. 2);
- 10 Steps in Writing the Research Paper Markman, Roberta J. and Marie L. Waddell, 4th ed., 1989 (Meriam Library, n.d., Writing Term Papers section, para. 3);
- The Little, Brown Guide to Writing Research Papers Meyer, Michael, 3rd ed., 1994 (Meriam Library, n.d., Writing Term Papers section, para. 4);
- The Perfect Term Paper: Step By Step Mulkerne, Donald J.D., 1988 (Meriam Library, n.d., Writing Term Papers section, para. 5);
- A Short Guide to College Writing Barnet, Sylvan, 2002 (Meriam Library, n.d., Writing Term Papers section, para. 6);
- Writing Research Papers: a Norton Guide Walker, Melissa, 4th ed., 1997
   (Meriam Library, n.d., Writing Term Papers section, para. 7);
- Writing Research Papers: a Complete Guide Lester, James D., 9th ed., 1999
   (Meriam Library, n.d., Writing Term Papers section, para. 8);
- Writing Research Papers: a Guide to the Process Weidenborner, Stephen, 6th ed., 2001 (Meriam Library, n.d., Writing Term Papers section, para. 9); and,
- Writing the Modern Research Paper Dees, Robert, 1993 (Meriam Library, n.d., Writing Term Papers section, para. 10).

**Annex 2: Sherman Kent's Probability Table** 

100% Certainty				
The General Area of Possibility				
93%	give or take about 6%	Almost certain		
75%	give or take about 12%	Probable		
50%	give or take about 10%	Chances about even		
30%	give or take about 10%	Probably not		
7%	give or take about 5%	Almost certainly not		
0% Impossibility				

(Kent, 1964, p. 55)

**Annex 3: List Of Commonly Used Words Of Estimative Probability** 

For example:				
Possible	conceivable could may might perhaps			
Almost certain	virtually certain all but certain highly probable highly likely odds [or chances] overwhelming			
Probable	likely we believe we estimate			
50-50	chances about even chances a little better [or less] than even improbable unlikely			
Probably not	we believe that not we estimate that not we doubt, doubtful			
Almost certainly not	virtually impossible almost impossible some slight chance highly doubtful			

(Kent, 1964, pp. 59-60)

#### Annex 4: Awards Given To Marie Rackam's Cozy English Courses

- Film Advisory Board Award of Excellence, 2003 in the category of Educational Video;
- 2001 Bronze Telly Award Winner in the category of Non-Broadcast Film/Video & TV Programs - Educational For Academic Use;
- Amtec Awards 2001 Award of Excellence Winner in the category of Informational-Visual;
- 2001 Questar Award Finalist in the category of Educational For Home Video;
- PanasonicMedia Agency Video Communications Award, in co-operation with Amtec Awards, 2001 1st Place Winner for Best Overall Videotape Production in the category of Government/Commercial/Industrial;
- Panasonic Best of Festival Award, in co-operation with Amtec Awards, 2001 1st Place Media Agency Communications Award, awarded by Panasonic to the educational video production judged to have accomplished the highest overall level of communicative excellence;
- 2001 Canada Post Literacy Finalist to Marie Rackham for The Basic Cozy Grammar Course in the category of Outstanding Literacy Educator;
- 2001 Aegis Award Winner in the category of Training/Education;
- WorldFest Houston International Film Festival, 2001 Bronze Remi Award in the category of Educational/Instructional Adult;
- Videographer Awards 2001 Award of Distinction in the category of Videos For Sale/Instructional;
- Axiem Awards 2001 Copper Award First Place Winner in the category of Educational Video for Home Market;
- Film Advisory Board Award of Excellence Winner in the category of Educational Video;
- Cinema in Industry Award International Association of Audio Visual Communicators, 2001 Gold Cindy Award Winner in the category of Arts and Humanities;
- Communicators Award, internationally recognizing outstanding work in the communications field, 2001 Award of Distinction Winner in the category of Instructional Videos; and
- Education Clearinghouse, 2002 Award of Excellence in the Grammar and Vocabulary category (Splashes, n.d., paras. 1-14, 18).

#### Annex 5: Pages 1-4 Of The Vietnam Memo



11 September 1967

606027

#### IMPLICATIONS OF AN UNFAVORABLE OUTCOME IN VIETNAM

#### PROBLEM AND ASSUMPTIONS

- 1. At some stage in most debates about the Victuan war, questions like the following emerge: What would it actually mean for the US if it failed to achieve its stated objectives in Victuam? Are our vital interests in fact involved? Would abandomment of the effort really generate other serious dangers? Enturally, those who oppose the war tend to minimize the costs of failures, while those who support the war point ominously to far-reaching negative effects which they allege would follow such a methack. This aspect of the Victuam argument has lacked clear and detailed definition on both sides, even though it is crucial to the Why and Wherefore of our whole involvement there.
- 2. What we are attempting in this paper is to provide some greater precision about the probable costs, for American policy and interests as a whole, of an unfavorable outcome in Vietnam. It is not assumed in this inquiry that such an outcome is now likely; it has been demonstrated, in fact, that the Communists

cannot win if the US is determined to prevent it. But the question of what it would mean for the US if its own objectives are not achieved is relevant and fair. The debate itself shows the need for a sounder basis by which to measure the costs of an unfavorable outcome against the exertions which would presumably still be required to achieve a favorable one.

- 3. What we mean by an "unfavorable outcome" needs to be defined with some realism. We are not discussing the entirely impleusible hypothesis of a political-military collapse, say, the precipitate withdrawal of American forces or sweeping political concessions tentamount to granting Hanoi outright achievement of its aims in the South. It seems realistic to believe, given the present scale of UE involvement and the sacrifices already made, that this government would approach a settlement short of its aims only by a series of steps involving gradual adjustment of our present political-military posture. Apart from the domestic political pressures that would cause this to be so, the very concern to minimize unfavorable effects on other relationships and on the American world position would argue strongly for such a course.
- b. We assume, therefore, that an outcome favorable to the Communists would come about as the result of a process of negotiation,

- 2 -

probably fairly prolonged. A resulting political settlement, whether or not it looked at first like a "compromise," would in the end lead to the establishment of Communist power in South Vietnam. Insofar as the broader repercussions of this development are concerned, a critical variable would be the time the process took. If it took 10 years, obviously the significance of US acceptance of such a settlement would tend to be lost in the new context produced by interim events. We are assuming for purposes of this discussion that the period would be short enough to make it impossible to blur the fact that American policy had met with a serious reverse; it would appear in fact that the US had deliberately accepted a faulty settlement rather than pay the price of trying longer to evert it. This seems a realistic assumption for two reasons: the Communists would probably try to turn a shaky settlement to early advantage and would be little concerned to delay their triumph for a long period in order to save face for the US; and, the divided non-Communist political forces in South Vietnam, if left to their own devices under such a settlement, would probably not be able to put up effective political resistance for very long.

 If all this went off peacefully, it would constitute the best rather than the worst case, or rather a successful US effort

- 3 -

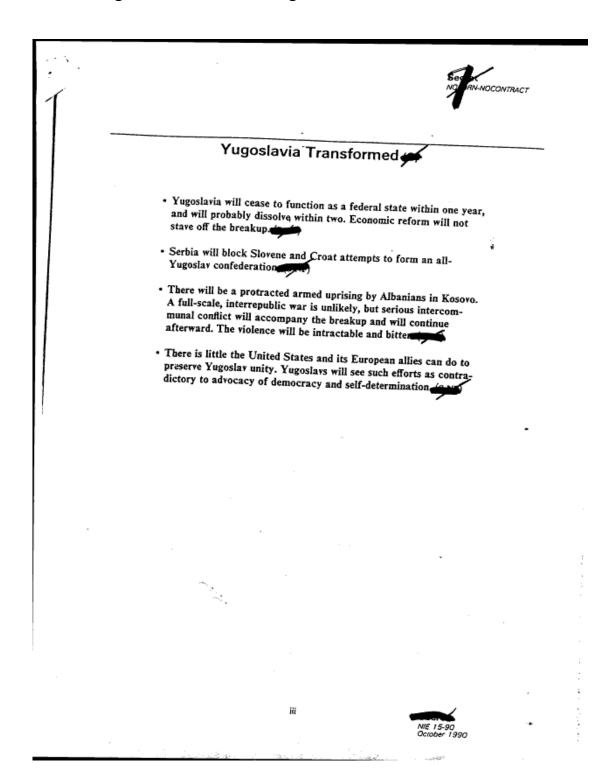
to achieve the best case, given a decision to place priority on ending hostilities rather than on achievement of the aims we have so far pursued. It is possible, however, that events would be precipitated in such a manner that the outcome — the taking of power by the Communists — would emerge very rapidly and in conditions of breakdown and disorder on the non-Communist side. There could be a spectacle of panic flight from the country, suicidal resistance by isolated groups, and Communist terror and vengeance. Clearly, if this worst case came about, the discredit the US would earn, which would be seen by many as not merely political but also as moral discredit, would be far greater. The following discussion assumes a negotiated settlement applied in reasonably orderly circumstances, but which nevertheless works out to Communist advantage within a relatively brief period, say, a year or so.

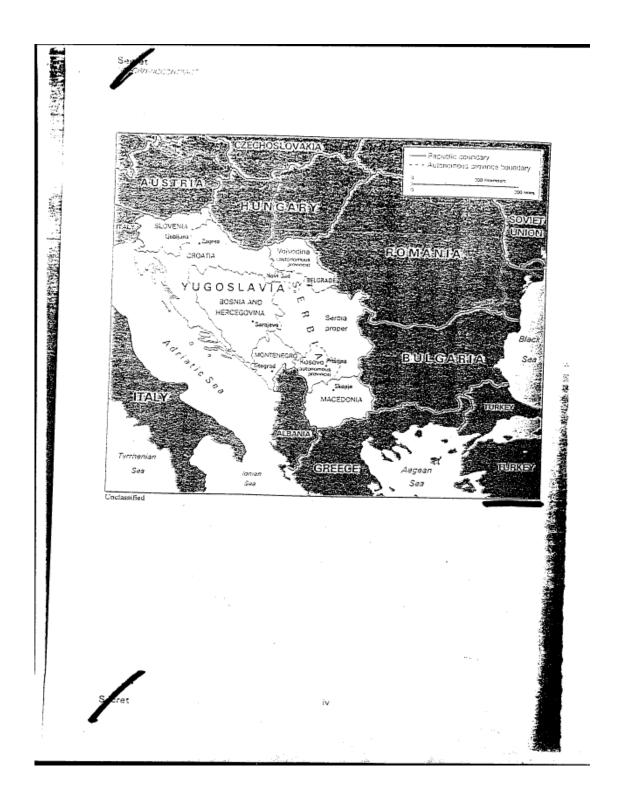
#### SOME GENERAL PROPOSITIONS

6. Viewed purely as an intellectual problem, the question posed can have no complete and wholly satisfactory answer. One is asked to assume a single event, the scenario and context for which cannot be described in detail, and to project its consequences for subsequent developments on the world scene as a whole. In fact,

- 4 -

#### Annex 6: Pages 1-7 Of The 1990 Yugoslavia NIE







### Key Judgments

The old Yugoslav federation is coming to an end because the reservoir of political will holding Yugoslavia together is gone. Within a year the federal system will no longer exist; within two years Yugoslavia will probably have dissolved as a state.

Although elsewhere in Eastern Europe economic and political reform will be interdependent, Yugoslavia's future will be decided by political and ethnic factors. Even successful economic reforms will not hold the country together.

The strongest cohesive forces at work in Yugoslavia are those within Serbia, Croatia, and Slovenia. They are a mix of national pride, local economic aspirations, and historically antagonistic religious and cultural identifications. In Slovenia, and to a lesser extent Croatia, the new nationalism is westward looking, democratic, and entrepreneurial; in Serbia, it is rooted in statist economics, military tradition, and a preference for strong central government led by a dynamic personality.

Neither the Communist Party nor the Yugoslav National Army (JNA) will be able to hold the federation together. The party is in a shambles; the army has lost prestige because of its strong Communist Party identification and because much of the country considers it a Serb-dominated institution. No all-Yugoslav political movement has emerged to fill the void left by the collapse of the Titoist vision of a Yugoslav state, and none will.

Alternatives to dissolution now being discussed in various quarters are unlikely to succeed. A loose confederation will appeal to Croatia and Slovenia, but Serbs will block this in an effort to preserve Serb influence. Moreover, a Serb-dominated attempt to muddle through, using the old federal institutions and military brinksmanship to block independence, will not be tolerated by the newly enfranchised, nationalistic electorates of the breakaway republics. Serbs know this

It is likely that Serbian repression in Kosovo will result in an armed uprising by the majority Albanian population, supported by large Albanian minorities in Macedonia and Montenegro. This, in turn, will create strong pressure on those republics to associate themselves closely with Serbia.

A slide from sporadic and spontaneous ethnic violence into organized interrepublic civil war is also a danger, but it is unlikely during the period of this Estimate. Serbia's commitment of resources to pacification of the Albanians in Kosovo will constrain its ability to use military means to bring Serbian minorities in the western part of the country under its direct control. The Serbs, however, will attempt to foment uprisings by Serb minorities elsewhere—particularly in Croatia and Bosnia-Hercegovina—and large-scale ethnic violence is likely.

The United States will have little capacity to preserve Yugoslav unity, notwithstanding the influence it has had there in the past. But leaders from various republics will make claims on US officials to advance their partisan objectives. Federal and Serb leaders will emphasize statements in support of territorial integrity. Slovenes, Croats, and Kosovars, however, will play up US pressure for improved performance on human rights and self-determination. Thus, Washington will continue to be drawn into the heated arena of interethnic conflict and will be expected to respond in some manner to the contrary claims of all parties. (5)

The Soviet Union will have only an indirect influence—for example, through multinational forums—on the outcome in Yugoslavia. The Europeans have some leverage, but they are not going to use it to hold the old Yugoslavia together

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#### Discussion

How's the weather, Jeeves? Exceptionally clement, sir. Anything in the papers? Some slight friction threatening in the Balkans, sir. Otherwise, nothing.

> P. G. Wodehouse The Inimitable Jeeves, 1928

Behind the crumbling facade of the old Yugoslav federation new political realities are emerging:

- A centralized Serbian state, ruled initially by Slobodan Milosevic's former Communist Party and probably joined with Montenegro in a new federation.
- A Macedonian state, probably dominated by Communist Party factions with differing views on the desirability of democratization and market reforms but subject to Serbian influence articulated in terms of control over their Albanian minority populations.
- Croatian and Slovenian states in the northwest, oriented toward Western Europe and probably associated in a confederal arrangement with or without the participation of Bosnia and Hercegovina

With the departure of Slovenia and Croatia over the next year, the Yugoslav federal system will cease to function. Efforts to construct a confederal alternative to the current system will probably fail within the two-year span of this Estimate, leading to the dissolution of Yugoslavia as a state.

#### Centrifugal Forces Dominant

Strong centrifugal forces are driving the 70-year-old Yugoslav state apart. Although such forces have been present for years and the federation has somehow survived, this time is different. Tito, who embodied the concept of a federal Yugoslavia, has been dead for 10 years. Absent a leader of his stature, the Yugoslav

federation has been held together by institutional inertia, mainly in the Communist Party and the military. The party organization has been shattered and its ideological appeal leached away by recent developments elsewhere in Central Europe and the Balkans

The Yugoslav National Army (JNA), because of its strong party identification and because much of the country considers it a Serb-dominated institution, has lost much of its stature as custodian of the Yugoslav idea. Although the army might unilaterally attempt to hold the federation together, its leadership recognizes that it could not do this alone and probably believes that any attempt to do so would cause the JNA to dissolve along its ethnic faultlines. Dissolution in this circumstance would prompt Slovenia and Croatia to rapidly assert as much control as possible over army assets on their territories, and the JNA's remaining resources would be transferred into Serbian, and possibly other, state armed force

National pride, economic aspirations, and an upwelling of ethnic-based religious and cultural identification will continue to push Slovenia and Croatia toward independence. Secessionist sentiment has been powerfully stimulated by Serbian attempts to dominate the federal political process. Breakaway claims have reached the point of explicit demands and practical measures that are incompatible with the old Federal Constitution. Secessionist steps include declarations of sovereignty, pursuit of independent foreign policy goals, the appearance of republic-based paramilitary formations, plans for republic-based and -controlled military forces, and claims to exclusive control of natural resources. These measures have yet to be knitted together into explicit, internally consistent statements of national identity, but they will be within the span of this Estimate

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Tito and Nationalism: Missed Opportunity



In the mid-1960s, Tito relaxed the more stringent internal police controls and instituted administrative reform, devolving significant decision authority from the federal level to that of the republics. However, when a postwar generation of nationalist leaders began to emerge in the republics-most visibly in Croatia-Tito proved unable to accept the political consequences of diluted federal and party authority. In late 1971, he purged the Croatian party and state leaders, also coming down hard on "nationalist extremists" as well as liberals in Serbia, Slovenia, and Macedonia. In doing so he eliminated younger, dynamic nationalist Communist Party elites in those key republics who might have been able to fashion a long-term, workable compromise between disparate nationalist aspirations and federal structures. In the final analysis, Tito proved unable to deal constructively with nationalist aspirations of the South Slav peoples-aspiration he had successfully suppressed under the party banner of "brotherhood and unity" after the Communists" victory in 1945. Tito's multinational Yugoslav state was thus vulnerable after his death to the erupting nationalism. (5



Slobodan Milosevic

Overheated nationalism fostered by Serbian extremists is the strongest among the new forces driving the republics apart, and it will not go away. Serbian President Milosevic seized power on a wave of populism and ethnic assertion. His followers will remain susceptible to these themes as the cement of Communism erodes and other republics resist the imposition of Serbian control. Milosevic's personal style—dramatic gestures, risk taking, and drive-reinforces the appeal his policies have to the Serbian masses. Although Milosevic's nationwide power peaked when the other republics rejected his leadership at the last (and probably final) all-Yugoslav party congress, his future in Serbia remains solid. In October 1989, he won a mandate-with 80 percent of the vote-to rule Serbia for four more years. He will be reelected in December 1990, in a victory as illegitimate as the previous year's, but the salient factor for Yugoslavia is that nearly all Serbian opposition parties either hold equally or more extreme nationalistic views or have been co-opted by Milosevic's rhetoric concerning Kosovo and Croatia. The Milosevic-controlled press continue to fan the Serbian nationalist flames in Kosovo and Croatia, but he is no longer the master of that nationalism; hardline opposition parties are undermining Milosevic's tactical position by precipitating confrontations with ethnic minorities in the Sandzak, Bosnia, and Vojvodina. Thus, virtually any ruler of

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 Nevertheless, FBI information since that time indicates patterns of suspicious activity in this country consistent with preparations for hijackings or other types of attacks, including recent surveillance of lederal buildings in New York.

The FBI is conducting approximately 70 full field investigations throughout the US that it considers Bin Ladin-related. CIA and the FBI are investigating a call to our Embassy in the UAE in May saying that a group of Bin Ladin supporters was in the US planning attacks with explosives.

# Annex 7: Declassified Pages Of The August 6, 2001 PDB

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# References

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#### **Chapter 1**

Ignatius, D. (2005) *Can the Spy Agencies Dig Out?*, Washington Post, Page A25, Friday, April 15, 2005. Accessed April 18, 2005, from <a href="http://www.washingtonpost.com/wp-dyn/articles/A55028-2005Apr14.html">http://www.washingtonpost.com/wp-dyn/articles/A55028-2005Apr14.html</a>

Silberman, L.H., Robb, C.S., Levin, R.C., McCain, J., Rowen, H.S., Slocombe, W.B., Studeman, W.O., Wald, P.M., Vest, C.M., & Cutler, L. (2005) *The Commission on the Intelligence Capabilities of the United States Regarding Weapons of Mass Destruction: Report to the President of the United States*, Washington, DC: March 31, 2005

De Jong, B., Platje, W. & Steele, R.D. Eds. (2003). *Peacekeeping Intelligence: Emerging Concepts for the Future*, OSS International Press. Accessed March 2, 2005, from <a href="http://www.amazon.com/gp/product/product-description/0971566127/ref=dp\_proddesc\_0/104-3325240-7169552?%5Fencoding=UTF8&n=283155">http://www.amazon.com/gp/product/product-description/0971566127/ref=dp\_proddesc\_0/104-3325240-7169552?%5Fencoding=UTF8&n=283155</a>

Woodward, B. (2004) *With CIA Push, Movement To War Accelerated*, WashingtonPost.com, Page A01, April 19, 2004. Accessed May 12, 2005, from <a href="http://www.washingtonpost.com/wp-dyn/articles/A22552-2004Apr18">http://www.washingtonpost.com/wp-dyn/articles/A22552-2004Apr18</a> 4.html

Woodward, B. & Eggen, D. (2002) *August Memo Focused On Attacks in U.S.*, Washington Post, May 18, 2002. Accessed May 4, 2005, from <a href="http://www.commondreams.org/headlines02/0518-04.htm">http://www.commondreams.org/headlines02/0518-04.htm</a>

#### **Chapter 2**

Bickler, C., Borden, A., Chazan, Y., Davis, A., Jukes, S., MacLeod, J., Stroehlein, A., Sullivan, S., Vultee, J., & West, J. (2004) *Reporting For Change: A Handbook For Local Journalists In Crisis Areas*, Institute for War & Peace Reporting, 2004. Accessed April 8, 2005, from <a href="http://www.iwpr.net/pdf/09\_iwpr\_training\_manual.pdf">http://www.iwpr.net/pdf/09\_iwpr\_training\_manual.pdf</a>

Borden, A. (n.d.) *IWPR House Style Guide (English)*, IWPR. Accessed May 6, 2005, from <a href="http://www.iwpr.net/index.pl?development/resources/training\_styleguide.html">http://www.iwpr.net/index.pl?development/resources/training\_styleguide.html</a>

BusinessWriting.com (n.d.) Business Writing Courses For Business People And Writing Trainers. Accessed May 6, 2005, from <a href="http://www.businesswriting.com/">http://www.businesswriting.com/</a>

Department of Energy Office of Science and Technology (n.d.) *Style Guide*, DOE OST. Accessed April 8, 2005, from <a href="http://apps.em.doe.gov/OST/commnotebook/stylguid.pdf">http://apps.em.doe.gov/OST/commnotebook/stylguid.pdf</a>

Meriam Library (n.d.) *Style Manuals*, California State University: Chico. Accessed April 8, 2005, from <a href="http://www.csuchico.edu/lins/handouts/">http://www.csuchico.edu/lins/handouts/</a> <u>Style Research Manuals.pdf</u>

Reichenbaugh, B. (2004) *Internal (Employee) Communications*, National Weather Service Directives System: Maryland, August 16, 2004. Accessed April 8, 2005, from <a href="http://www.nws.noaa.gov/directives/001/pd00104004b.pdf">http://www.nws.noaa.gov/directives/001/pd00104004b.pdf</a>

Ward, Maj. D., USAF (2005) *The Findability Quotient: Making Intel Accessible*, presented to the 2005 International Conference on Intelligence Analysis: McLean, Virginia. Accessed May 6, 2005, from <a href="https://analysis.mitre.org/proceedings/Final\_Papers\_Files/342\_Camera\_Ready\_Paper.pdf">https://analysis.mitre.org/proceedings/Final\_Papers\_Files/342\_Camera\_Ready\_Paper.pdf</a>

# Chapter 3

None.

## **Chapter 4: Section One**

Allen, D.J. & Shellum, B.G. (2002) *DIA At The Creation 1961-1965: Origination Documents of the Defense Intelligence Agency*, DIA History Office: Washington, DC, 2002.

Armstrong, F.T. (2002) *Ways to Make Analysis Relevant but Not Prescriptive*, Studies in Intelligence, vol. 46(3). Accessed March 6, 2005, from <a href="http://www.cia.gov/csi/studies/vol46no3/article05.html">http://www.cia.gov/csi/studies/vol46no3/article05.html</a>

Aqute Research, *About Us*, Aqute Research, n.d. Accessed April 7, 2005, from <a href="http://www.aqute.com/aboutus.htm">http://www.aqute.com/aboutus.htm</a>

Barndt, W.D., Jr. (1999) *New to Competitive Intelligence? 10 Tips for Survival and Success*, Competitive Intelligence Magazine, vol. 2(3), July-September 1999, pp. 23-6. Accessed April 12, 2005, from <a href="http://www.scip.org/news/cimagazine\_article.asp?id=203">http://www.scip.org/news/cimagazine\_article.asp?id=203</a>

Berkeley, G. (1965) *For a Board of Definitions*, Studies in Intelligence, Summer 1965, vol. 9(3), 13-17. Accessed March 4, 2005, from <a href="http://www.odci.gov/csi/kent\_csi/author-combine.htm">http://www.odci.gov/csi/kent\_csi/author-combine.htm</a> (see Berkeley, George, "For a Board of Definitions")

Best, R.A. Jr. (2005) *Intelligence Issues for Congress*, CRS Issue Brief for Congress, Congressional Research Service, Library of Congress, updated March 22, 2005. Accessed April 4, 2005, from <a href="http://us.gallerywatch.com/docs/php/US/CRS/IB10012.pdf">http://us.gallerywatch.com/docs/php/US/CRS/IB10012.pdf</a>

Breckenridge, S.D. (1986) *The CIA and the US Intelligence System*, Westview Press: Boulder.

Brooks, D. (2005) *The Art of Intelligence*, New York Times, Op-Ed, Late Edition, Section A, Page 15, Column 6, April 2, 2005.

Bush, G.W. (2004) *Economy Continues to Get Stronger -- President Bush Visits California: Remarks by the President in a Conversation on the Economy*, White House Press Release: March 4, 2004. Accessed April 15, 2005, from <a href="http://www.whitehouse.gov/news/releases/2004/03/20040304-3.html">http://www.whitehouse.gov/news/releases/2004/03/20040304-3.html</a>

Business Intelligence (2004) *Business Intelligence: Home*, Business Intelligence, Optima Publishing Limited. Accessed April 7, 2005, from <a href="http://www.business-intelligence.co.uk/">http://www.business-intelligence.co.uk/</a>

Business Intelligence (2004) *Business Intelligence: Testimonials*, Business Intelligence, Optima Publishing Limited. Accessed April 7, 2005, from <a href="http://www.business-intelligence.co.uk/testimonials.asp">http://www.business-intelligence.co.uk/testimonials.asp</a>

Carter, D.L., PhD (2004) Law Enforcement Intelligence: A Guide for State, Local, and Tribal Law Enforcement Agencies, U.S. Department of Justice Office of Community Oriented Policing Services, November 23, 2004. Accessed April 7, 2005, from <a href="http://www.cops.usdoj.gov/default.asp?Item=1404">http://www.cops.usdoj.gov/default.asp?Item=1404</a>

Clark, General W. K. (2001). Waging Modern War: Bosnia, Kosovo, and the Future of Combat, Public Affairs: New York.

Clarke, R.V. & Eck, J. (n.d.) *Become a Problem-Solving Crime Analyst in 55 Small Steps*, Jill Dando Institute of Crime Science: London.

CNN (2004) *Woodward: Tenet told Bush WMD case a 'slam dunk'*, Inside Politics, CNN.com, April 19, 2004. Accessed April 1, 2005, from <a href="http://www.cnn.com/2004/ALLPOLITICS/04/18/woodward.book/">http://www.cnn.com/2004/ALLPOLITICS/04/18/woodward.book/</a>

Counterdrug Intelligence Executive Secretariat (2003) *The Community Model: A Basic Training Curriculum for Law Enforcement Analysts*, Counterdrug Intelligence Executive Secretariat: Washington, DC, March 2003.

Darling, A. B. (1990). *The Central Intelligence Agency: An Instrument of Government, to 1950*, Pennsylvania State University Press: University Park.

Davis, J. (1995) *A Policymaker's Perspective On Intelligence Analysis*, Studies In Intelligence, vol. 38(5). Accessed March 7, 2005, from <a href="http://www.cia.gov/csi/studies/95unclass/Davis.html">http://www.cia.gov/csi/studies/95unclass/Davis.html</a>

Davis, J. (1996) The Challenge of Managing Uncertainty: Paul Wolfowitz on Intelligence Policy-Relations, Studies in Intelligence, 1996, vol. 39(6). Accessed March 6, 2005, from <a href="http://www.cia.gov/csi/studies/96unclass/davis.htm">http://www.cia.gov/csi/studies/96unclass/davis.htm</a>

Davis, J. (2003) *Sherman Kent's Final Thoughts on Analyst-Policymaker Relations*, The Sherman Kent Center for Intelligence Analysis, June 2003, vol. 2(3). Accessed March 10, 2005, from <a href="http://www.cia.gov/cia/publications/Kent\_Papers/vol2no3.htm">http://www.cia.gov/cia/publications/Kent\_Papers/vol2no3.htm</a>

De Jong, B., Platje, W. & Steele, R.D. Eds. (2003). *Peacekeeping Intelligence: Emerging Concepts for the Future*, OSS International Press. Accessed March 2, 2005, from <a href="http://www.amazon.com/gp/product/product-description/0971566127/ref=dp\_proddesc\_0/104-3325240-7169552?%5Fencoding=UTF8&n=283155">http://www.amazon.com/gp/product/product-description/0971566127/ref=dp\_proddesc\_0/104-3325240-7169552?%5Fencoding=UTF8&n=283155</a>

Federal Bureau of Investigation (2005) *Vacancy Information: Intelligence Analyst, Announcement number FO-2005-0022*, FBI. Accessed April 15, 2005, from <a href="https://jobs1.quickhire.com/scripts/fbi.exe/runjobinfo">https://jobs1.quickhire.com/scripts/fbi.exe/runjobinfo</a>

Fiora, B. (2002) *Best Practices Forum: Writing Intelligence Reports that Get Read*, Competitive Intelligence Magazine, vol. 5(1), January-February 2002, pp. 52-3. Accessed April 12, 2005, from <a href="http://www.scip.org/news/cimagazine\_article.asp?">http://www.scip.org/news/cimagazine\_article.asp?</a> id=374

Gartner, Inc.: About Gartner (2005) *About Gartner*, Gartner, Inc.. Accessed April 7, 2005, from <a href="http://www.gartner.com/5">http://www.gartner.com/5</a> about/company information/41a.html

Gartner, Inc.: Our Business (2005) *Our Business*, Gartner, Inc. Accessed April 7, 2005, from <a href="http://www.gartner.com/5">http://www.gartner.com/5</a> about/our business/

Hanrahan, J.P. (1967) *Intelligence for the Policy Chiefs*, Studies in Intelligence, Winter 1967, vol. 11(1), pp. 1-12. V11:1-1-12 (Winter 1967). Accessed March 4, 2005, from <a href="http://www.odci.gov/csi/kent\_csi/author-combine.htm">http://www.odci.gov/csi/kent\_csi/author-combine.htm</a> (See Hanrahan, James P., "Intelligence for the Policy Chiefs")

Hohhof, B. (2005) *Building better deliverables*, PowerPoint Presentation for SCIP's 20th Annual International Conference & Exhibition, SCIP: Chicago, April 2005.

IACA: About the IACA (2005) *About the IACA*, International Association of Crime Analysts. Accessed April 7, 2005, from <a href="http://www.iaca.net/About.asp">http://www.iaca.net/About.asp</a>

IACA: Brochure (2005) *International Association of Crime Analysts: 2005 Training Conference Brochure*, IACA. Accessed April 7, 2005, from <a href="http://www.iaca.net/Conferences/2005/2005ConferenceBrochure.pdf">http://www.iaca.net/Conferences/2005/2005ConferenceBrochure.pdf</a>

Interpol (n.d.) *Criminal Intelligence Analysis*, Interpol. Accessed March 18, 2005, from <a href="http://www.interpol.int/Public/CIA/Default.asp">http://www.interpol.int/Public/CIA/Default.asp</a>

Johnson, L.K. (1989) *America's Secret Power: The CIA In A Democratic Society.* Oxford University Press: New York.

Kean, T.H., Hamilton, L.H., Ben-Veniste, R., Kerrey, B., Fielding, F.F., Lehman, J.F., Gorelick, J.S., Roemer, T.J., Gorton, S., Thompson, J.R. (2004) *The 9/11 Commission Report: Final Report of the National Commission on Terrorist Attacks Upon the United States, Authorized Edition*, W.W. Norton & Company: New York.

Kent, S. (1951) *Strategic Intelligence for American World Policy*, Princeton University Press: New Jersey.

Kent, S. (1964) *Words of Estimative Probability*, Studies in Intelligence, Fall 1964, vol. 8(4), pp. 49-65. Accessed March 4, 2005, from <a href="http://www.cia.gov/csi/books/shermankent/6words.html">http://www.cia.gov/csi/books/shermankent/6words.html</a>

Kerr, R.J. (1995) *Intelligence Community Management*, House Permanent Select Committee on Intelligence, November 16, 1995. Accessed April 15, 2005, from <a href="http://www.fas.org/irp/congress/1995">http://www.fas.org/irp/congress/1995</a> <a href="http://www.fas.org/irp/congress/1995">hr/kerr1116.htm</a>

Kirkpatrick, L.B. (1968) *The Real CIA*, The MacMillan Company: New York.

Knapp, F.A., Jr. (1964) *Styles and Stereotypes in Intelligence Studies*, vol. 8(2), pp. A1-A5, Spring 1964. Accessed March 8, 2005, from <a href="http://www.odci.gov/csi/kent\_csi/author-combine.htm">http://www.odci.gov/csi/kent\_csi/author-combine.htm</a> (See Knapp, Frank A. Jr. "Styles and Stereotypes in Intelligence Studies")

Kneisler, P. & White, M. (2005) *Hostile/Non-hostile Deaths*, Iraqi Coalition Casualty Count, updated March 31, 2005. Accessed April 1, 2005, from <a href="http://www.icasualties.org/oif/HNH.aspx">http://www.icasualties.org/oif/HNH.aspx</a>

Kovar, R. (2000) *Mr. Current Intelligence: An Interview with Richard Lehman*, Studies in Intelligence, no. 9, Summer 2000. Accessed April 16, 2005, from <a href="http://www.cia.gov/csi/studies/summer00/art05.html">http://www.cia.gov/csi/studies/summer00/art05.html</a>

Krizan, L. (1999) *Intelligence Essentials For Everyone*, Joint Military Intelligence College: Washington, DC, June 1999. Accessed April 9, 2005, from <a href="http://www.scip.org/ci/krizan/IntelligenceEssentialsFull.pdf">http://www.scip.org/ci/krizan/IntelligenceEssentialsFull.pdf</a>

Laquer, W. (1985) *A World of Secrets: The Uses and Limits of Intelligence*, Basic Books, Inc.: New York.

Lawrence, T.C. (2005) *Writing a Successful CI Newsletter*, Competitive Intelligence Magazine, vol. 8(1), January-February 2005, pp. 18-22. Accessed April 12, 2005, from <a href="http://www.scip.org/news/cim0105/Lawrence.pdf">http://www.scip.org/news/cim0105/Lawrence.pdf</a>

Leahy, Lt. Gen. P.F., AO (2002) Address by Chief of Army Lieutenant General P.F. Leahy, AO to Defence Watch Seminar, Canberra, Australia, November 19, 2002. Accessed March 6, 2005, from <a href="http://www.defence.gov.au/media/SpeechTpl.cfm?">http://www.defence.gov.au/media/SpeechTpl.cfm?</a> CurrentId=2084

Lownthal, M.M. (2003) *Intelligence: From Secrets to Policy, Second Edition*, CQ Press: Washington, DC.

Martin, J.W. (1970) *What Basic Intelligence Seeks to Do*, Studies in Intelligence, Fall 1970, vol. 14(2), pp. 103-13. Accessed March 5, 2005, <a href="http://www.odci.gov/csi/kent\_csi/author-combine.htm">http://www.odci.gov/csi/kent\_csi/author-combine.htm</a> (See Martin, Joseph W., "What Basic Intelligence Seeks To Do")

Medina, C.A. (2002) *The Coming Revolution in Intelligence Analysis: What To Do When Traditional Models Fail*, Studies in Intelligence, vol. 46(3). Accessed March 7, 2005, from <a href="http://www.cia.gov/csi/studies/vol46no3/article03.html">http://www.cia.gov/csi/studies/vol46no3/article03.html</a>

McDowell, D. (1998) Strategic Intelligence: A Handbook for Practitioners, Managers and Users, Istana Enterprises: Australia.

MILNET Analysis (2005). *Changes to the U.S. Intelligence Community*, updated February 17, 2005. Accessed April 1, 2005, from <a href="http://www.milnet.com/Changes%20to%20Intelligence%20Community.html#early">http://www.milnet.com/Changes%20to%20Intelligence%20Community.html#early</a>

Petersen, M. (2003) Advice from a DI Careerist: The Challenge for the Political Analyst, Studies in Intelligence, vol. 47(1). Accessed March 7, 2005, from <a href="http://www.cia.gov/csi/studies/vol47no1/article05.html">http://www.cia.gov/csi/studies/vol47no1/article05.html</a>

Petersen, M. (2005) Toward a Stronger Intelligence Product: Making the Analytic Review Process Work, Studies In Intelligence, vol. 49(1), pp. 55-61.

Petersen, M.B. (1994) *Applications in Criminal Analysis: A Sourcebook*, Praeger: Westport.

Pike, J. (1996). *Central Intelligence Agency: History*. September 23, 1996. Retrieved March 23, 2005, from http://www.fas.org/irp/cia/ciahist.htm

Pyramid Research (2004) *Communications Markets in Saudi Arabia*, Pyramid Research LLC, February 2004 (updated).

Pyramid Research (2005) *Pyramid Research: Home*, Pyramid Research LLC. Accessed April 7, 2005, from <a href="http://www.pyramidresearch.com/">http://www.pyramidresearch.com/</a>

Pyramid Research (2005) *Pyramid Research: Inside Pyramid*, Pyramid Research. Accessed April 7, 2005, from <a href="http://www.pyramidresearch.com/">http://www.pyramidresearch.com/</a> ip corporate overview.htm

Roberts, P., Rockefeller, J.D. IV, Hatch, O.G., Dewine, M., Bond, C.S., Lott, T., Snowe, O.J., Hagel, C., Chambliss, S., Warner, J.W., Levin, C., Feinstein, D., Wyden, R., Durbin, R.J., Bayh, E., Edwards, J., Mikulski, B., Frist, B., & Daschle, T.A. (2004) *Report on the U.S. Intelligence Community's Prewar Assessments on Iraq*, Select

Committee On Intelligence: United States Senate, July 7, 2004. Accessed March 7, 2005, from <a href="http://www.globalsecurity.org/intell/library/congress/2004\_rpt/iraq-wmd-intell\_intro-a.htm">http://www.globalsecurity.org/intell/library/congress/2004\_rpt/iraq-wmd-intell\_intro-a.htm</a>

Roberts, S. (2004) *Intelligence Failure: From Pearl Harbor to 9/11 and Iraq*, America Abroad Media, July 2004 (full radio transcript). Accessed April 1, 2005, from <a href="http://www.americaabroadmedia.org/docs/Intelligence%20Failure%20Transcript.pdf">http://www.americaabroadmedia.org/docs/Intelligence%20Failure%20Transcript.pdf</a>

Sawka, K. (2000) *The Analyst's Corner: Keep Your Message Short and Sweet*, Competitive Intelligence Magazine, third quarterly issue, October-December 2000. Accessed April 12, 2005, from <a href="http://www.scip.org/news/cimagazine\_article.asp?">http://www.scip.org/news/cimagazine\_article.asp?</a> <a href="mailto:id=175">id=175</a>

Schrage, M. (2005) What Percent Is 'Slam Dunk'?: Give Us Odds on Those Estimates, Washington Post, Page B01, Sunday, February 20, 2005.

Settecase, M. (2004) Northeast Ohio Chapter Meeting: "Using Visuals and Best Practices for Analysis & Delivering Implications", SCIP. Accessed April 3, 2005, from <a href="https://s08.123signup.com/servlet/SignUp?P=185700&PG=1857182300">https://s08.123signup.com/servlet/SignUp?P=185700&PG=1857182300</a>

Silberman, L.H., Robb, C.S., Levin, R.C., McCain, J., Rowen, H.S., Slocombe, W.B., Studeman, W.O., Wald, P.M., Vest, C.M., & Cutler, L. (2005) *The Commission on the Intelligence Capabilities of the United States Regarding Weapons of Mass Destruction: Report to the President of the United States*, Washington, DC: March 31, 2005.

Simon, N. (2000) *Managing the CI Department: Cognition and Performance*, Competitive Intelligence Magazine, vol. 3(3), July-September 2000. Accessed April 12, 2005, from <a href="http://www.scip.org/news/cimagazine\_article.asp?id=192">http://www.scip.org/news/cimagazine\_article.asp?id=192</a>

Simon, N.J. (2002) *Managing the CI Department: Whose Fault Is It, Anyway?*, Competitive Intelligence Magazine, vol. 5(2), March-April 2002. Accessed April 12, 2005, from http://www.scip.org/news/cimagazine\_article.asp?id=401

Steele, R.D. (2002) *The New Craft of Intelligence: Achieving Asymmetric Advantage in the Face of Nontraditional Threats*, February 2002. Accessed April 1, 2005, from <a href="http://www.au.af.mil/au/awc/awcgate/ssi/craft.pdf">http://www.au.af.mil/au/awc/awcgate/ssi/craft.pdf</a>

Truman, H. S. (1956). *Memoirs by Harry S. Truman: Volume Two, Years of Trial and Hope*, Doubleday & Company, Inc.: New York.

U.S. Senate Select Committee on Intelligence & U.S. House Permanent Select Committee on Intelligence (2002) *Joint Inquiry into Intelligence Community Activities Before and After the Terrorist Attacks of September 11, 2001*, Washington DC,

December 2002. Accessed April 15, 2005, from <a href="http://www.fas.org/irp/congress/2002">http://www.fas.org/irp/congress/2002</a> rpt/recommendations.html

Utley, G. (2004) *Intelligence Failure: From Pearl Harbor to 9/11 and Iraq*, America Abroad Media, July 2004 (full radio transcript). Accessed April 1, 2005, from <a href="http://www.americaabroadmedia.org/docs/Intelligence%20Failure%20Transcript.pdf">http://www.americaabroadmedia.org/docs/Intelligence%20Failure%20Transcript.pdf</a>

Value Line (n.d.) What is Value Line?, Value Line, Inc. Accessed April 6, 2005, from <a href="http://www.valueline.com/why\_use\_what.html">http://www.valueline.com/why\_use\_what.html</a>

Value Line (2001) *Part 3 – Ratings & Reports*, Value Line, Inc., Value Line Publishing, Inc.: February 2, 2001. Accessed April 6, 2005, from <a href="http://www.valueline.com/samples/vlis-report.pdf">http://www.valueline.com/samples/vlis-report.pdf</a>

Ward, C.T. (1999) *Real Life CI: Myths About CI Report Writing*, Competitive Intelligence Magazine, vol. 2(1), January-March 1999, pp. 35-6. Accessed April 12, 2005, from <a href="http://www.scip.org/news/cimagazine\_article.asp?id=313">http://www.scip.org/news/cimagazine\_article.asp?id=313</a>

Wark, D.L. (1964) *The Definition of Some Estimative Expressions*, Studies in Intelligence, Fall 1964, vol. 8(4), pp. 67-80. Accessed March 5, 2005, from <a href="http://www.cia.gov/csi/kent\_csi/docs/v08i4a07p\_0001.htm">http://www.cia.gov/csi/kent\_csi/docs/v08i4a07p\_0001.htm</a>

Watanabe, F. (1997) *How to Succeed in the DI: Fifteen Axioms for Intelligence Analysts*, Studies in Intelligence, Semiannual Edition(1). Accessed March 4, 2005, from http://www.cia.gov/csi/studies/97unclass/axioms.html

Wernicke, S. (n.d.) *What is a Crime Bulletin*. Accessed March 18, 2005, from <a href="http://www.iaca.net/resources/articles/bulletins.html">http://www.iaca.net/resources/articles/bulletins.html</a>

Wikipedia (2005) *Korean War*, Wikipedia, updated April 1, 2005. Accessed April 1, 2005, from <a href="http://en.wikipedia.org/wiki/Korean War">http://en.wikipedia.org/wiki/Korean War</a>

Wikipedia (2005) *Yom Kippur War*, Wikipedia, updated March 31, 2005. Accessed April 1, 2005, from <a href="http://en.wikipedia.org/wiki/Yom\_Kippur\_War">http://en.wikipedia.org/wiki/Yom\_Kippur\_War</a>

Wheaton, K.J. (2001) *The Warning Solution: Intelligent Analysis in the Age of Information Overload*, AFCEA International Press, Fairfax.

Williams, J.A. (1999) *Intelligence Essentials For Everyone: Preface*, Joint Military Intelligence College: Washington, DC, June 1999. Accessed April 9, 2005, from <a href="http://www.scip.org/ci/krizan/IntelligenceEssentialsFull.pdf">http://www.scip.org/ci/krizan/IntelligenceEssentialsFull.pdf</a>

### **Chapter 4: Section Two**

(n.d.) To Justify or Not to Justify, Upper & Lower Case Magazine. Accessed March 18, 2005, from <a href="http://www.itcfonts.com/ulc/article.asp?">http://www.itcfonts.com/ulc/article.asp?</a>
<a href="mailto:nCo=AFMT&sec=ulc&issue=articles&art=justify">nCo=AFMT&sec=ulc&issue=articles&art=justify</a>
<a href="mailto:Source Reliability: 1/3">Source Reliability: 1/3</a>

Acton, G.S., PhD (2004) *Rubric for Evaluating Papers*, Rochester Institute of Technology, November 2004. Accessed April 25, 2005, from <a href="http://www.personalityresearch.org/writing/rubric.html">http://www.personalityresearch.org/writing/rubric.html</a> *Source Reliability: 2/3* 

Agel, J., Fiore, Q., and McLuhan, M. (2001) *The Medium Is The Massage: An Inventory Of Effects*, Gingko Press: California. *Source Reliability: 3/3* 

Alley, M., Crowley, L., Donnell, J., & Moore, C., Eds. (2004) *Writing Guidelines for Engineering and Science Students*, Virginia Tech: July 2004. Accessed March 7, 2005, from <a href="http://www.writing.eng.vt.edu/workbooks/intro.html#audience">http://www.writing.eng.vt.edu/workbooks/intro.html#audience</a>

Bartleby.com (1999) *The Elements of Style*, New York: Bartleby.com. Accessed April 21, 2005, from <a href="http://www.bartleby.com/141/">http://www.bartleby.com/141/</a>

Barton, S. (1998) *What Is Dyslexia?*, Bright Solutions for Dyslexia, LLC. Accessed April 24, 2005, from <a href="http://www.dys-add.com/define.html">http://www.dys-add.com/define.html</a>

Beckno, J. (n.d.) *Action Officer: Staff Writing*, U.S. Army Training And Doctrine Command. Accessed March 10, 2005, from <a href="http://www.au.af.mil/au/awc/awcgate/army/writing.pdf">http://www.au.af.mil/au/awc/awcgate/army/writing.pdf</a>

Blankfield, S., Davey, J., & Sackville, Dr. A. (2002) Supporting students with dyslexia in the effective use of C&IT in their academic studies, Edge Hill. Accessed April 24, 2005, from <a href="http://www.edgehill.ac.uk/TLD/research/sedafinalreport.pdf">http://www.edgehill.ac.uk/TLD/research/sedafinalreport.pdf</a>
Source Reliability: 3/3

Brooks, M. (1989) *Instant Rapport*, Warner Books: New York. *Source Reliability: 3/3* 

Bruner Business Communication (2003) *Good Readers Depend on Good Writers*, The Write Stuff, vol. 7(2), Summer 2003. Accessed March 15, 2005, from <a href="http://www.brunerbiz.com/pdfs/News\_18.pdf">http://www.brunerbiz.com/pdfs/News\_18.pdf</a>

Source Reliability: 2/3

BusinessWriting.com (n.d.) *Business writing courses for business people and writing trainers*. Accessed March 8, 2005, from <a href="http://businesswriting.com/tests/activepassive.htm">http://businesswriting.com/tests/activepassive.htm</a>

Central Intelligence Agency (1999) *Style Manual and Writers Guide for Intelligence Publications, Sixth Edition*, DI/Office of Support Services/Multi-media Production Group: September 1999.

Cortes, M.A. (n.d.) *Information Design*, San Diego State University. Accessed March 12, 2005, from <a href="http://coe.sdsu.edu/eet/articles/infodesign/index.htm">http://coe.sdsu.edu/eet/articles/infodesign/index.htm</a> *Source Reliability: 1/3* 

CustomPapers.com (n.d.) *The Fundamentals of Writing a Good Research Paper*. Accessed April 25, 2005, from <a href="http://www.korepetycje.com/writing-resources/good-research-paper.html">http://www.korepetycje.com/writing-resources/good-research-paper.html</a>

Source Reliability: 2/3

Darling, C. (n.d.) *The Passive Voice*, Capital Community College Foundation: Connecticut. Accessed April 26, 2005, from <a href="http://webster.commnet.edu/grammar/passive.htm">http://webster.commnet.edu/grammar/passive.htm</a>

Source Reliability: 2/3

Davies, D.R. (n.d.) *Journalism: Writing Guidelines*, University of Southern Mississippi. Accessed April 26, 2005, from <a href="http://ocean.otr.usm.edu/~ddavies/courses/goodwriting.html">http://ocean.otr.usm.edu/~ddavies/courses/goodwriting.html</a>

Source Reliability: 2/3

Davis, R.D. & Braun, E. (1998) *Adult Dyslexia and ADD: Effects in the Workplace*, The Dyslexic Reader. Accessed April 24, 2005, from <a href="http://www.dyslexia.com/library/adultdys.htm">http://www.dyslexia.com/library/adultdys.htm</a>

Source Reliability: 3/3

Dewsnap, D. (2005) *The Unrecognized Importance Of Grammar In Sales Writing*, BusinessKnowledgeSource.com, January 4, 2005. Accessed April 26, 2005, from <a href="http://businessknowledgesource.com/marketing/">http://businessknowledgesource.com/marketing/</a>

the unrecognized importance of grammar in sales writing 000765.html Source Reliability: 2/3

Gocsik, K., PhD. (2005) *Attending to Grammar*, Dartmouth Writing Program, Dartmouth College: January 11, 2005. Accessed April 26, 2005, from <a href="http://www.dartmouth.edu/~writing/materials/student/ac\_paper/grammar.shtml">http://www.dartmouth.edu/~writing/materials/student/ac\_paper/grammar.shtml</a> *Source Reliability: 2/3* 

Good, R. (2002) What are "Serif" and "Sans-serif" fonts?, MasterViews International, Issue 8, January 15, 2002. Accessed April 28, 2005, from <a href="http://www.masterviews.com/2002/01/15/what\_are\_serif\_and\_sansserif\_fonts.htm">http://www.masterviews.com/2002/01/15/what\_are\_serif\_and\_sansserif\_fonts.htm</a>
Source Reliability: 2/3

Goodman, A. (n.d.) *Typographic Design*, Deakin University: Australia. Accessed March 12, 2005, from <a href="http://www.deakin.edu.au/~agoodman/scc110/lecture11.pdf">http://www.deakin.edu.au/~agoodman/scc110/lecture11.pdf</a> *Source Reliability: 3/3* 

Grabelski, D. (2005) *Re: LE Style Manuals*, email correspondence from Jennifer Wozny to Dave Grabelski, April 30, 2005.

Greenfield, J. (2000) *Web Page Legibility Recommendations*, Miyazaki International College: Japan, October 1, 2000. Accessed April 27, 2005, from <a href="http://www.miyazaki-mic.ac.jp/faculty/jgreenfi/Legibility/recommendations.html">http://www.miyazaki-mic.ac.jp/faculty/jgreenfi/Legibility/recommendations.html</a> *Source Reliability: 2/3* 

Haley, A. (n.d.) *It's About Legibility*, Fonts.com. Accessed April 28, 2005, from <a href="http://www.fonts.com/AboutFonts/Articles/Typography/Legibility.htm">http://www.fonts.com/AboutFonts/Articles/Typography/Legibility.htm</a> *Source Reliability: 2/3* 

Howard Bear, J. (n.d.) *Is there such a thing as a perfect page layout?*, About.com, Desktop Publishing. Accessed March 20, 2005, from <a href="http://desktoppub.about.com/cs/pagelayout/f/layout\_rules.htm">http://desktoppub.about.com/cs/pagelayout/f/layout\_rules.htm</a> *Source Reliability: 3/3* 

Howe, J. (2005) *Typography Tips*, Santa Ana College: California, Spring 2005. Accessed March 12, 2005, from <a href="http://sacbusiness.org/marketing/john%20materials/Bus%20127/topography%20tips.pdf">http://sacbusiness.org/marketing/john%20materials/Bus%20127/topography%20tips.pdf</a> *Source Reliability: 2/3* 

Jacquet, J-P., Abran, A. (1998) *Metrics Validation Proposals: A Structured Analysis*, Department of Computer Science, Université du Québec à Montréal: Quebec, September 1998. Accessed May 4, 2005, from <a href="http://www.lrgl.uqam.ca/publications/pdf/361.pdf">http://www.lrgl.uqam.ca/publications/pdf/361.pdf</a>

Jolly, C.J.H. (1988) *The Marketability of Spelling Reform*, Journal of the Simplified Spelling Society, 1988(2), pp. 17-9 (later designated J8). Accessed April 25, 2005, from <a href="http://www.spellingsociety.org/journals/j8/marketability.php">http://www.spellingsociety.org/journals/j8/marketability.php</a> *Source Reliability: 3/3* 

Klariti Writing Services (n.d.) *Why Your White Papers Don't Work?*, Klariti Writing Services. Accessed March 18, 2005, from <a href="http://www.klariti.com/business-writing/Why-White-Papers-dont-work.shtml">http://www.klariti.com/business-writing/Why-White-Papers-dont-work.shtml</a>

Source Reliability: 2/3

Krametbauer, A. (n.d.) *The OSS in Europe*, University of San Diego: California. Accessed May 2, 2005, from <a href="http://history.acusd.edu/gen/WW2Timeline/oss3.html">http://history.acusd.edu/gen/WW2Timeline/oss3.html</a>

Lewis, Col. C.L. (2002) *Ensuring Military Justice*, Combined Arms Center Military Review, September-October 2002 English Edition. Accessed April 29, 2005, from <a href="http://www.leavenworth.army.mil/milrev/English/SepOct02/lewis.htm">http://www.leavenworth.army.mil/milrev/English/SepOct02/lewis.htm</a>

Mandossian, O.A. (2003) Tested Copywriting Secrets: How To Boost Your Advertising Pulling-Power, Win More Sales, And Eliminate "Writer's Block", Heritage House: California.

Source Reliability: 3/3

Mandossian, O.A. (2003) Fundamentals of Web Traffic Conversion: 29 Success Secrets That Help You Create And Sell Winning Info Products...Even While You Sleep!, Heritage House: California.

Source Reliability: 3/3

Moore, E.H. (2004) *Self-Editing Quick Tips for Tightening Your Copy*, Georgia School Public Relations Association: Georgia. Accessed April 26, 2005, from <a href="http://www.gspra.org/docs/2004confmaterials/writing%20tips.pdf">http://www.gspra.org/docs/2004confmaterials/writing%20tips.pdf</a> *Source Reliability: 2/3* 

Morkes, J., & Nielsen, J. (1997) *Concise, SCANNABLE, and Objective: How to Write for the Web*, SunSoft usability laboratories: California. Accessed March 9, 2005, from <a href="http://www.useit.com/papers/webwriting/writing.html">http://www.useit.com/papers/webwriting/writing.html</a> *Source Reliability: 3/3* 

National Association for College Admission Counseling (n.d.) *Journal of College Admission Writer's Guide and Tips*, NACAC. Accessed March 10, 2005, from <a href="http://www.nacac.com/downloads/journal\_tips.pdf">http://www.nacac.com/downloads/journal\_tips.pdf</a>

National Cancer Institute (2003) *About This Site*, NCI. Accessed April 23, 2005, from <a href="http://usability.gov/guidelines/about.html">http://usability.gov/guidelines/about.html</a>

Source Reliability: 3/3

National Cancer Institute (2003) *How To Use This Site*, NCI. Accessed May 2, 2005, from <a href="http://usability.gov/guidelines/intro.html#cata">http://usability.gov/guidelines/intro.html#cata</a>

National Intelligence Council (2004) *Tracking the Dragon: National Intelligence Estimates on China During the Era of Mao, 1948-1976*, National Intelligence Council: October 2004.

National Literacy Trust (1999) *Key literacy statistics - adults and general*, National Literacy Trust, September 1999. Accessed April 24, 2005, from <a href="http://www.literacytrust.org.uk/Database/stats/keystatsadult.html">http://www.literacytrust.org.uk/Database/stats/keystatsadult.html</a>

O'Reilly Network (n.d.) *Nadav Savio*, O'Reilly Media, Inc.. Accessed April 28, 2005, from <a href="http://www.oreillynet.com/pub/au/223">http://www.oreillynet.com/pub/au/223</a>

O'Sullivan, T., PharmD, BCPS (n.d.) *Technical Writing*, University of Washington. Accessed March 18, 2005, from <a href="http://courses.washington.edu/pharm309/techwriting.pdf">http://courses.washington.edu/pharm309/techwriting.pdf</a>

Source Reliability: 2/3

Outing, S., & Ruel, L. (n.d.) *The Best of Eyetrack III: What We Saw When We Looked Through Their Eyes*. Accessed March 16, 2005, from <a href="http://www.poynterextra.org/eyetrack2004/main.htm">http://www.poynterextra.org/eyetrack2004/main.htm</a>

Source Reliability: 3/3

Pfautz, J., Fouse, A, Roth, E., & Karabaich, B. (2005) Supporting Reasoning about Cultural and Organizational Influences in an Intelligence Analysis Decision Aid, presented to the 2005 International Conference on Intelligence Analysis: McLean, Virginia. Accessed May 6, 2005, from <a href="https://analysis.mitre.org/proceedings/Final\_Papers\_Files/293\_Camera\_Ready\_Paper.pdf">https://analysis.mitre.org/proceedings/Final\_Papers\_Files/293\_Camera\_Ready\_Paper.pdf</a>

Public Agenda (2001) *Reality Check 2002*, Public Agenda Online. Accessed April 26, 2005, from <a href="http://www.publicagenda.org/specials/rcheck2002/reality.htm">http://www.publicagenda.org/specials/rcheck2002/reality.htm</a>
Source Reliability: 3/3

Public Agenda (2005) *What Is Public Agenda?*, Public Agenda Online. Accessed April 26, 2005, from <a href="http://www.publicagenda.org/aboutpa/aboutpa/aboutpa.cfm">http://www.publicagenda.org/aboutpa/aboutpa.cfm</a>

Purdue University Online Writing Lab & Hansard, M. (n.d.) *Active and Passive Voice*, OWL, Purdue University. Accessed April 26, 2005, from <a href="http://owl.english.purdue.edu/handouts/grammar/g\_actpass.html">http://owl.english.purdue.edu/handouts/grammar/g\_actpass.html</a>

Source Reliability: 2/3

Rackam, M. (n.d.) *Free Homeschool Curriculum Spelling Course*, Splashes From The River. Accessed April 25, 2005, from <a href="http://www.splashesfromtheriver.com/spelling/index.htm">http://www.splashesfromtheriver.com/spelling/index.htm</a>

Source Reliability: 3/3

Rackam, M. (n.d.) "Why grammar? It stifles creativity!", Splashes From The River. Accessed April 26, 2005, from <a href="http://www.splashesfromtheriver.com/">http://www.splashesfromtheriver.com/</a> why grammar.htm

Source Reliability: 3/3

Rainger, P. (2003) *A Dyslexic Perspective on e-Content Accessibility*, TechDis, January 20, 2003. Accessed March 18, 2005, from <a href="http://www.dpi.org/en/resources/pdfs/03-04-01\_dyslexic.pdf">http://www.dpi.org/en/resources/pdfs/03-04-01\_dyslexic.pdf</a> *Source Reliability: 2/3* 

Riches, D. (n.d.) *Email writing tips*, Riches Communications Pty. Ltd., Australia. Accessed April 29, 2005, from <a href="http://www.riches.com.au/articles/writing-email-tips.htm">http://www.riches.com.au/articles/writing-email-tips.htm</a>

Robbins, R.A. (2004) Painting with print: Incorporating concepts of typographic and layout design into the text of legal writing documents, The Journal of the Association of Legal Writing Directors, vol. 2, Fall 2004. Accessed March 14, 2005, from <a href="http://www.ca7.uscourts.gov/Rules/Painting\_with\_Print.pdf">http://www.ca7.uscourts.gov/Rules/Painting\_with\_Print.pdf</a>
Source Reliability: 3/3

Sasse, C.M., Dr. (2000) *Business Writing Resource Kit*, Rockhurst University. Accessed March 10, 2005, from <a href="http://cte.rockhurst.edu/FileUploads/Microsoft Word Resource Kit Rev3.pdf">http://cte.rockhurst.edu/FileUploads/Microsoft Word Resource Kit Rev3.pdf</a>

Savio, N. (n.d.) Web Typography Tutorial - Day One, Lesson 1, WebMonkey.com. Accessed April 28, 2005, from <a href="http://webmonkey.wired.com/webmonkey/01/45/index3a\_page8.html?tw=design">http://webmonkey.wired.com/webmonkey/01/45/index3a\_page8.html?tw=design</a>

Source Reliability: 2/3

Shapiro, H. (n.d.) *Ten Commandments of Business Writing*, Empire State College. Accessed March 14, 2005, from <a href="http://www1.esc.edu/personalfac/hshapiro/writing\_program/students/reference/main/commandments.htm">http://www1.esc.edu/personalfac/hshapiro/writing\_program/students/reference/main/commandments.htm</a> *Source Reliability: 2/3* 

Splashes From The River (n.d.) *Cozy English Courses on Video and DVD: Awards and Endorsements*, Splashes From The River. Accessed May 2, 2005, from <a href="http://www.splashesfromtheriver.com/grammar course awards.htm">http://www.splashesfromtheriver.com/grammar course awards.htm</a>

Strizver, I. (2001) *Emphasis: Italics and Boldface*, Upper & Lower Case Magazine, vol. 1(6). Accessed March 18, 2005, from <a href="http://www.itcfonts.com/ulc/article.asp?nCo=AFMT&sec=ulc&issue=27.2.1&art=emphasis">http://www.itcfonts.com/ulc/article.asp?nCo=AFMT&sec=ulc&issue=27.2.1&art=emphasis</a> *Source Reliability: 3/3* 

Strizver, I. (2001) *Justified Type*, Upper & Lower Case Magazine, vol. 1(5). Accessed March 18, 2005, from <a href="http://www.itcfonts.com/ulc/article.asp?">http://www.itcfonts.com/ulc/article.asp?</a> <a href="mailto:nCo=AFMT&sec=ulc&issue=27.1.1&art=justified\_type">nCo=AFMT&sec=ulc&issue=27.1.1&art=justified\_type</a> <a href="mailto:Source Reliability:3/3">Source Reliability: 3/3</a>

Strunk, W., Jr. (1999) *The Elements of Style*, New York: Bartleby.com. Accessed March 7, 2005, from <a href="http://www.bartleby.com/141/">http://www.bartleby.com/141/</a>

The Writing Company (n.d.) *The Writing Company's Business Writing Workshops*, The Writing Company, Massachusetts. Accessed April 29, 2005, from <a href="http://thewritingco.com/business-writing-workshops.html">http://thewritingco.com/business-writing-workshops.html</a>

Thomas, E. (1995) *The Very Best Men, Four Who Dared: The Early Years Of The CIA*, Simon & Schuster: New York. Accessed May 2, 2005, from <a href="http://karws.gso.uri.edu/Marsh/Jfk-conspiracy/Very Best Men.htm">http://karws.gso.uri.edu/Marsh/Jfk-conspiracy/Very Best Men.htm</a>

Thompson, S.J., Johnstone, C.J. & Thurlow, M.L. (2002) *Universal Design Applied to Large Scale Assessments* (Synthesis Report 44), University of Minneapolis, National Center on Educational Outcomes: Minnesota, June 2002. Accessed April 25, 2005, from <a href="http://education.umn.edu/NCEO/OnlinePubs/Synthesis44.html">http://education.umn.edu/NCEO/OnlinePubs/Synthesis44.html</a> *Source Reliability: 3/3* 

Tynan, W.D., PhD (2003) *Learning Disorder: Reading*, eMedicine.com, June 25, 2003. Accessed April 24, 2005, from <a href="http://www.emedicine.com/ped/topic2792.htm">http://www.emedicine.com/ped/topic2792.htm</a>

United States Army Materiel Command (USAMC) (2003) *Administration: Staff Procedures*, Department of the Army Headquarters, AMC Memorandum no. 1(2), April 17, 2003. Accessed March 10, 2005, from <a href="http://www.amc.army.mil/amc/ci/pubs/m1\_2.pdf">http://www.amc.army.mil/amc/ci/pubs/m1\_2.pdf</a>

Walden Library (2003) *Peer Reviewed / Refeered*, Walden University: July 2003. Accessed May 2, 2005, from <a href="http://www.lib.waldenu.edu/serials.html">http://www.lib.waldenu.edu/serials.html</a>

Waechter, Lt. Col. B.M. & McAleer, Dr. G.R., Jr. (1996) Passing Fancy or Permanent Reform?: An Evaluation of Defense Acquisition Oversight and Review Integrated Product Team Implementation, The Industrial College of the Armed Forces, National Defense University: Washington. Accessed April 29, 2005, from <a href="http://www.ndu.edu/library/ic6/96-E-08.pdf">http://www.ndu.edu/library/ic6/96-E-08.pdf</a>

Walker, D. (2004) *The key to email: a two-second grab*, Sydney Morning Herald, June 15, 2005. Accessed March 18, 2005, from <a href="http://www.smh.com.au/articles/2004/06/14/1087065076891.html?oneclick=true">http://www.smh.com.au/articles/2004/06/14/1087065076891.html?oneclick=true</a>

Wanderman, R. (n.d.) *Typography and Readability*, Capitol Region Education Council: Connecticut. Accessed March 18, 2005, from <a href="http://www.crec.org/atdn/reading/Typography-readability.pdf">http://www.crec.org/atdn/reading/Typography-readability.pdf</a> *Source Reliability: 2/3* 

Ward, Maj. D., USAF (2005) *The Findability Quotient: Making Intel Accessible*, Presented to the 2005 International Conference on Intelligence Analysis: McLean, Virginia. Accessed May 6, 2005, from <a href="https://analysis.mitre.org/proceedings/Final-Papers-Files/342">https://analysis.mitre.org/proceedings/Final-Papers-Files/342</a> Camera Ready Paper.pdf

Welch, D.E. (2003) *Build A Career Portfolio To Highlight Your Accomplishments*, Tech Republic, August 20, 2003. Accessed April 26, 2005, from <a href="http://techrepublic.com.com/5102-6269-5060665.html">http://techrepublic.com.com/5102-6269-5060665.html</a> *Source Reliability: 2/3* 

Wheeler, L.K., Dr. (n.d.) *Passive Voice*, Carson-Newman College: Tennessee. Accessed April 26, 2005, from <a href="http://web.cn.edu/kwheeler/gram\_passive\_voice.html">http://web.cn.edu/kwheeler/gram\_passive\_voice.html</a> *Source Reliability: 2/3* 

Wiley.com (n.d.) *Author Information*, John Wiley & Sons. Accessed April 25, 2005, from <a href="http://www.wiley.com/WileyCDA/WileyTitle/productCd-0471383414,descCd-authorInfo.html">http://www.wiley.com/WileyCDA/WileyTitle/productCd-0471383414,descCd-authorInfo.html</a>

Worthington, J.M., Jr. (n.d.) *What Recruiters Are Saying About Resumes*, Net-Temps.com. Accessed April 25, 2005, from <a href="http://www.net-temps.com/careerdev/?type=topics&topic=resume&id=133">http://www.net-temps.com/careerdev/?type=topics&topic=resume&id=133</a> *Source Reliability: 3/3* 

Yoshida, K. (2001) *Avoiding Font Fiascoes: A Workshop*, FGM Inc.: May 15, 2001. Accessed March 24, 2005, from <a href="http://www.stc.org/48thConf/postconf/entire\_fonts2001.pdf">http://www.stc.org/48thConf/postconf/entire\_fonts2001.pdf</a> *Source Reliability: 2/3* 

Youngman, M., & Scharff, Dr. L. (1998) *Text Width and Margin Width Influences on Readability of GUIs*, Stephen F. Austin State University: Texas. Accessed April 27, 2005, from <a href="http://hubel.sfasu.edu/research/textmargin.html">http://hubel.sfasu.edu/research/textmargin.html</a> *Source Reliability: 3/3* 

## **Chapter 4: Section Three**

British Broadcasting Service (n.d.) *Yugoslavia 1945*, BBC: UK. Accessed May 10, 2005, from <a href="http://news.bbc.co.uk/hi/english/static/map/yugoslavia/">http://news.bbc.co.uk/hi/english/static/map/yugoslavia/</a>

CBS (2004) *Clarke's Take On Terror*, CBSNews.com, March 21, 2004. Accessed May 12, 2005, from <a href="http://www.cbsnews.com/stories/2004/03/19/60minutes/main607356.shtml">http://www.cbsnews.com/stories/2004/03/19/60minutes/main607356.shtml</a>

Central Intelligence Agency (1990) *Yugoslavia Transformed*, CIA: Washington, October 1, 1990. Accessed May 9, 2005, from <a href="http://www.foia.cia.gov/search.asp?">http://www.foia.cia.gov/search.asp?</a> <a href="pageNumber=1&freqReqRecord=nic\_geo\_eur.txt">pageNumber=1&freqReqRecord=nic\_geo\_eur.txt</a>

Central Intelligence Agency (2001) *Bin Ladin Determined To Strike In US*, President's Daily Brief, August 6, 2001. Accessed May 4, 2005, from <a href="http://www.fas.org/irp/cia/product/pdb080601.pdf">http://www.fas.org/irp/cia/product/pdb080601.pdf</a>

Gardner, L.C. (2005) *Introduction*, National Intelligence Council. Accessed May 8, 2005, from <a href="http://www.cia.gov/nic/foia\_vietnam\_intro.html">http://www.cia.gov/nic/foia\_vietnam\_intro.html</a>

National Intelligence Council (n.d.) *NIC Personnel*, NIC. Accessed May 12, 2005, from <a href="http://www.cia.gov/nic/NIC\_personnel.html">http://www.cia.gov/nic/NIC\_personnel.html</a>

New School University (n.d.) Ambassador Warren Zimmermann, former Distinguished Fellow at the New School, Passes Away. Accessed May 12, 2005, from <a href="http://www.yale56.org/WZ\_newschool.htm">http://www.yale56.org/WZ\_newschool.htm</a>

Office of National Estimates (1967) *Memo: Implications Of An Unfavorable Outcome In Vietnam*, ONE: Washington, September 11, 1967. Accessed May 8, 2005, from <a href="http://cia.gov/nic/PDF">http://cia.gov/nic/PDF</a> GIF declass support/vietnam/Memo 11-Sep-67.pdf

Princeton University (1997) *Diplomat and Scholar Robert L. Hutchings Named Assistant Dean of Woodrow Wilson School*, Communications and Publications: New Jersey, April 9, 1997. Accessed May 12, 2005, from <a href="http://www.princeton.edu/pr/news/97/q2/0409htch.html">http://www.princeton.edu/pr/news/97/q2/0409htch.html</a>

Wikipedia (2005) *Lawrence Eagleburger*, Wikipedia.org, last modified April 19, 2005. Accessed May 12, 2005, from <a href="http://en.wikipedia.org/wiki/Lawrence Eagleburger">http://en.wikipedia.org/wiki/Lawrence Eagleburger</a>

Woodward, B. & Eggen, D. (2002) *August Memo Focused On Attacks in U.S.*, Washington Post, May 18, 2002. Accessed May 4, 2005, from <a href="http://www.commondreams.org/headlines02/0518-04.htm">http://www.commondreams.org/headlines02/0518-04.htm</a>

# Chapter 5

None.