Intelligence Analysis

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March 12, 2019

Sfetcu, Nicolae, "Intelligence Analysis", SetThings (March 12, 2019), MultiMedia Publishing (ed.), URL = https://www.setthings.com/en/intelligence-analysis/

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A partial translation of:
Sfetcu, Nicolae, "Epistemologia serviciilor de informații", SetThings (4 februarie 2019), MultiMedia Publishing (ed.), DOI: 10.13140/RG.2.2.19751.39849, ISBN 978-606-033-160-5, URL = https://www.setthings.com/ro/e-books/epistemologia-serviciilor-de-informatii/

Intelligence analysis

The analysts are in the field of "knowledge". Intelligence refers to knowledge and the types of problems addressed are knowledge problems. So, we need a concept of work based on knowledge. We need a basic understanding of what we know and how we know, what we do not know, and even what can be known and what is not known. (Vandepeer 2014) Matthew Herbert offers a useful set of principles in discussing the guidance reported by Colin Powell to US intelligence director Mike McConnell. It is said that Powell advised McConnell as follows:

> "As an intelligence officer, your responsibility is to tell me what you know. Tell me what you don't know. Then you're allowed to tell me what you think. But you always keep those three separated." (Weiner 2007)

The analysis of information involves "turning disparate facts into focused conclusion." (Codevilla 1992)

No definition is conclusive in clarifying the meaning of the analysis. Likewise, the same person or group of people can achieve a multitude of roles in the process cycle, sometimes demanded by analysis.

The analysis should provide a useful basis for conceptualizing intelligence functions, of which the most important are "estimation" and "prediction". The intelligence itself, in its basic form, has a decision-making function. A decision is characterized by two main functions: (1) choices or judgments between competing alternatives, and (2) uncertainty of choices and judgments.

John Maynard Keynes states that, under uncertainty, "there is no scientific basis on which to form any calculable probability whatever. We simply do not know." (Keynes 1937) It follows that, in the absence of certainty, the decision-maker may be obliged to take measures with uncertain consequences, or to base his election on the predictions of the future, an exercise of subjective reasoning.

Radner described a characteristic optimal decision as follows: "For each signal, an optimal decision maximizes the conditional expected utility of the consequence, given the signal," as principle described as "maximizing conditional expected utility". (Radner 1972)

Researchers used concepts such as "incomplete information" and "uncertainty decisions" to study group interactions based on the (subjective) nature of the information that actors possess. (Ekpe 2005) For example, Andrew Kydd used the incomplete information model to explain Jervis's "spiral model of escalation in arms races". (Kydd 1997) The theory of uncertainty decisions also belongs to this family of incomplete knowledge behavior or actions conditioned by subjective feelings. As Arrow Kenneth observes, "uncertainty" means that the agent does not know the state of the world. (Arrow 1966)

Intelligence analysis applies individual and collective cognitive methods to assess data and test assumptions in a secret socio-cultural context. (Hayes 2007) The analyst must detect deceptions and extract the truth. The purpose of intelligence analysis is to reduce ambiguity. Assuming that enemies try to create confusion is not paranoid in the case of analysts, but realistic. According to Dick Heuer, in an experiment in which the analyst's behavior was studied, the process is incremental refining.

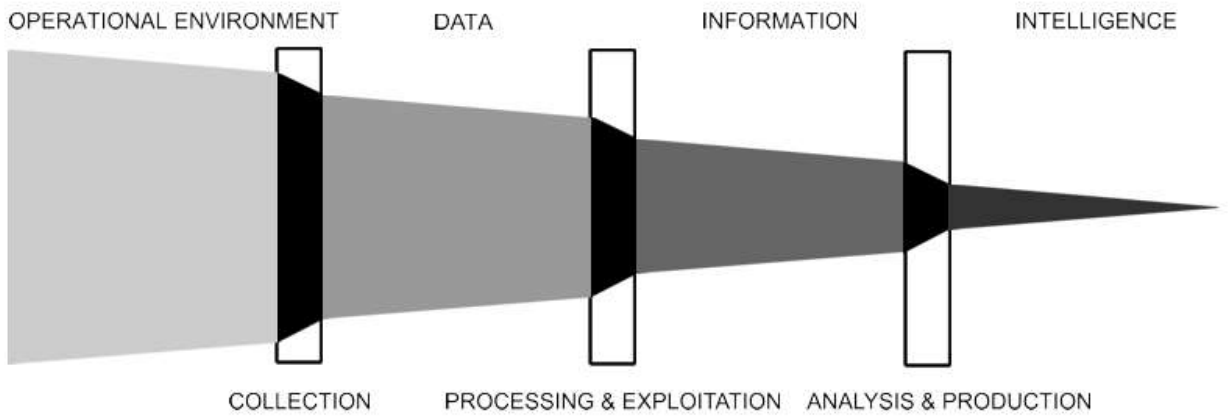

Figure 1 The intelligence activity reflects a progressive refinement of data and information

Academic disciplines examining the art and science of intelligence analysis are most commonly called "intelligence studies" and taught in specific institutions.

The analyst must constantly ask what want/must clients to know, how does they prefer the presentation to be? Are they trying to choose the best way of action or they have already chosen it and now they must know the obstacles and vulnerabilities on the chosen path?

Sometimes, when the producer strives to meet the needs of both internal and external customers, the solution is to create two different types of products, one for each type of customer. An internal product may contain details about sources, collection methods and analytical techniques, while an external product is more journalistic: Which? What? When? Where? Why?

"How" is often relevant to journalists, but not recommended in the intelligence activity. Actions are grouped in three stages:

1. The decision to act
2. Action
3. Disengagement from action (Ikle 2005)

Heuristic or semantic maps can help structure information, just like file folders and indexing cards. Also, databases with statistical techniques such as correlation, factor analysis, and time series analysis can provide insight.

The purpose of the information analysis is to reveal to a certain decision maker the underlying significance of the selected information. Analysts should start with confirmed facts, apply specialist knowledge to produce plausible findings but less secure conclusions, and even predict when the forecast is properly qualified. Analysts should not, however, engage in guesses that have no basis in facts.

Intelligence analysis involves the development of recommended predictions of action, based on a wide range of available sources of information, both open and undercover. The analysis is developed in response to the requirements of the organization's or client's management to help make decisions. (Sfetcu 2016)

One of the techniques used in intelligence analysis is the analysis of indicators, which uses historical data to expose trends and identify future major changes in an area of interest, helping to develop evidence-based prognoses with low cognitive bias. (Heuer and Pherson 2010)

Structured analytical techniques (SAT) have come to be used more since the World Trade Tower attacks of September 11, 2001, when the United States National Commission for Terrorist Action, or the 9/11 Commission, found that the intelligence community suffered "a failure to

challenge analytic mindsets, examine key assumptions, consider alternative hypotheses, and detect deceptive reporting." (Pherson 2013) These analytical tools, designed to better manage and standardize the performance of the analysis, are an attempt to align the profession to scientific principles. From an epistemological point of view, it can be argued that SATs generate propositional knowledge and inadequately acknowledge the value of "tacit knowledge" or unprotected knowledge in the problem-solving process in intelligence analysis. (Gentry 2015)

Indicators may be unique events or actions from a factor that signifies a major change, affecting conditions in the rest of the categories or other categories, or a combination of events that serve a similar function. The process is as follows:

1. Identify a set of categories relevant to the requirement
2. Identify a set of relevant factors for each category in the context of the global requirement
3. Identify short-term scenarios that may result from the immediate transfer or improvement of each factor
4. Identify a series of events or indicators that could mean improvement or deterioration within each factor
5. Review historical and ongoing events for indicators within each factor
6. Identify unique indicators and indicator trends to predict which short-term scenario is most likely to occur. (US Government 2009)

U.S. Intelligence Community standardizes its lists of indicators within an agency or across the community. (Artner, Girven, and Bruce 2016)

A common form of intelligence analysis is the use of social networking data, both on the Internet and on the mobile. Many government agencies are investing heavily in research involving social networking. Intelligence communities believe that the biggest threat comes from de-

centralizing, without leaders, the geographical dispersal of terrorists, extremists, and other subversive and dissident people. These types of threats are the easiest to counteract by discovering important nodes in the network and eliminating them. For this, a detailed network map is required. (Hogan, Carrasco, and Wellman 2007) It is considered that the use of social networking sites is a form of "participatory surveillance", where users of these sites are practically supervising themselves, displaying detailed personal information on public sites where can be seen by corporations and governments.

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