

# CHAPTER 1

## Introduction and Methodological Foundation

### 1.1 Significance of this research

An investigator's need to assess a suspect and attempt to determine their involvement in a specific criminal act and where to focus their investigation is paramount to the success of the investigation. There are many interview methods and techniques used today in an attempt to accomplish this, including the assessment of non-verbal behavior, the projective analysis of unwitting verbal cues, and statement analysis. While all of these methods are used in the search for truth, none of them are infallible. The Forensic Assessment Interview Technique (FAINT) integrates these individual methods in the expectation that the synergy of the three methods will increase the overall accuracy of any individual method by itself. While the Forensic Assessment Interview Technique (FAINT) is currently being used by intelligence, law enforcement and investigative personnel around the world to assist them in this vein, there has been little scientific research performed to determine the validity of this method. Validity is defined as whether a test measures what it purports to measure.

### 1.2 Aims and objectives of this research

FAINT maintains that there are differences in the non-verbal, verbal and written behavior of truthful and deceptive suspects, and that these differences can be quantified for valid evaluations of truth or deception.

This research investigated each of the component behaviors (nonverbal, unwitting verbal cues, and statement analysis) assessed by FAINT, and explains why and how each of these components have demonstrable differences between truthful and deceptive suspects, as well as the psychological and physiological reasons for them, and addressed the following questions:

1. Can investigators using FAINT observe demonstrable differences between a truthful suspect's nonverbal, verbal and written behavior, from that of a deceptive suspects.

2. Can investigators using FAINTE reassess previously observed and recorded behaviors and arrive at the same outcome as the original investigator?
3. How does the accuracy of an interviewing method such as FAINTE, which uses a numerical system to quantify observations, compare to a similar method of interviewing which does not numerically quantify observations?
4. Would developing a weighted scoring system based on the degree of correlation between commonly observed responses to individual questions with ground zero truth further increase the accuracy of the FAINTE method?
5. Can a scale predicting the accuracy of numerical assessment be derived from the FAINTE method which would accurately reflect an interviewee as truthful, deceptive or inconclusive?

### **1.3 Methodological foundation**

To determine the accuracy of the FAINTE technique, fifty-one actual interviews of suspects in criminal investigations conducted by this researcher at Keystone Intelligence Network, Inc., a private investigative agency incorporated and licensed in Philadelphia, Pennsylvania, U.S.A., were selected. The criterion for the selection of cases in this research was that each case was successfully resolved (ground zero truth was established for each suspect by their confession or the confession of another suspect in the investigation), and that the non-verbal, verbal and written behavior of each suspect was recorded, thus allowing for other evaluators to examine the same criteria.

These interviews comprised twenty-two separate investigations involving ten acts of theft, six alleged sexual assaults or rapes, three alleged sexual molestations, one arson, one alleged aggravated assault and one alleged robbery.

#### **1.3.1 Validity of the Forensic Assessment Interview Technique's (FAINTE) traditional 3 point scoring method**

A request for volunteers was sent to law enforcement and private investigators previously trained in the FAINT technique at the Academy for Scientific Investigative Training to participate in a validity and reliability research study of FAINT. This training consisted of successfully completing a five day seminar on the FAINT technique. The first four volunteers to respond were selected and asked to blindly evaluate the 51 interviews selected using the traditional FAINT 3 point scoring system, to make assessments of each interviewee's truth or deception. An evaluation was then made of the individual and group success of correctly solving the twenty-two cases, as well as the overall accuracy of the evaluator's in making determinations of truth or deception for each of the 51 suspects.

### **1.3.2 Weighted scoring system**

An analysis was performed of how each of the 51 interviewees answered identical FAINT questions to determine if there were observable differences which could then be correlated to their worth in predicting the final outcome of each interviewee's actual involvement in the case under investigation.

The weighted scoring system was implemented and applied as follows:

1. if the observation correctly agreed with the actual case outcome 90 percent of the time or better, a number of +3 for truth, or a -3 for deception, representing 3 standard deviations was assigned.
2. If predictability of the question agreed with the actual case outcome equaled 80 to 89 percent of the time, a +2 for truth, or a -2 for deception, representing 2 standard deviations was assigned.
3. If predictability of the question agreed with the actual case outcome 60 to 79 percent of the time a +1 for truth, or a -1 for deception, representing 1 standard deviation was assigned.
4. If predictability of the question had less than a 60 percent correlation to the final case outcome a 0 was assigned.

### **1.3.3 Validity of the Forensic Assessment Interview Technique's (FAINT) weighted scoring method**

The original 51 interviews were then presented to a new group, consisting of four blind evaluators, trained in the FAINT technique at a five day seminar in the newly developed weighted scoring system to make determinations of each suspect's truth or deception. An evaluation was then made of the individual and group success of correctly solving the twenty-two cases, as well as their overall accuracy in making determinations of truth or deception for each of the 51 suspects.

## **1.4 Compilation of the study**

To secure a logical train of thought, this research paper is compiled as follows: Chapter 2 provides a history of detection of deception and its importance to the Criminal Justice System. Chapter 3 through 5 examines each of the components of behavior that will be assessed by the FAINT interviewer. Chapter 3 reviews nonverbal behavior and how the FAINT interviewer will use it to assist in scoring and assessing a suspect. Chapter 4 deals with the FAINT question structure, and the assessment of verbal behavior. Chapter 5 reviews the methods of analyzing a written statement for truth or deception. In Chapter 6 the actual experiments are explained and the validity of both the FAINT 3 score and weighted systems are determined. Chapter 7 is an overview of the research findings, conclusions and recommendations. A comparison is made between these two FAINT systems and an earlier developed and studied system, the Behavioral Analysis Interview, which is also taught and used around the world by investigators to help determine a suspect's truth or deception.

## **1.5 Conclusion and summary**

In this Chapter the reader was introduced to the research topic and the methodological foundation. The goal of the research paper and compilation of the report was identified. To begin the search for truth, Chapter 2 focuses on the historical methods of detecting deception, from the beginning of humankind, to the present.

## CHAPTER 2

### History of Detection of Deception

#### 2.1 Introduction

From the beginning of time, when humans began forming social groups, there have been those amongst us who practiced deviant behavior. Behavior, which gone undetected and unpunished, may have resulted in the undermining of our primitive social structure<sup>1</sup>. Human's natural instinct is to seek pleasure and avoid pain. Herein lays the basic instinct for humans to deceive when confronted about acts they committed which they know are wrong. This is evident in the earliest writings of the Old Testament, in the questioning of Adam and Eve, and Cain's evasive answer, "Am I my brother's keeper?" where we see the attempts of humankind to avoid responsibility and escape punishment for their deviant actions.

#### 2.2 Trial by combat

There have been many attempts by societies throughout history to detect deception. Even the earliest of these tests still prevail. For example, if we examine "Trial by Combat,"<sup>2</sup> perhaps, the first test for determining truth, we can imagine two primitive human beings hunting. Both have thrown a stone or spear at the same fallen prey. They both approach it, each believing they have killed the prey and the animal belongs to them. They resolve the problem of ownership by entering into combat. The more skillful and powerful fighter wins and will eat that night. The other, will not. Of course this was not a very scientific method of determining truth, or settling debates.

By the middle ages such a test would seemingly lack the necessary logic and sophistication to be accepted by society. However, we can imagine two landlords having a dispute in which the teller of truth must be established. Each landlord selects their finest knight. The test they

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<sup>1</sup>Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>2</sup>Ibid.

select is still “Trial by Combat,” with a new concept added: the knight representing the truthful landlord will be victorious, not due to fighting skills, but due to “Divine” intervention. God would make it so!

Even today, on any weekend night, in every major city in the world, police are called to bars or pubs to intervene in disputes between two men about to enter into “Trial by Combat” to determine whom the young lady seated between them is actually with. The test lives on.

## **2.3 Trial by ordeal**

The next tests that can be documented to determine truth are classified as “Trial by Ordeal<sup>3</sup>”. These ordeals involved processes with underlying physiological and psychological principles. In both China and Africa early tests of “Trial by Ordeal” evolved around the still existing physiological principle that liars have dry mouths.

### **2.3.1 China**

In China they would instruct a suspect to tell his story and then have him fill his mouth with crushed dry rice. He was then told to spit the rice out. If his mouth was moist with saliva, the rice would cling together, and the task was very easy. This suspect was subsequently determined to be truthful. If the mouth was dry it became an impossible task, and the determination made was that the suspect was deceptive.<sup>4</sup>

### **2.3.2 Africa**

In Africa they had a similar test. A hot stone was placed on the suspect’s tongue. Again, if the mouth was moist, saliva protected the tongue from burning. If it was dry, the tongue would be burnt.<sup>5</sup>

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<sup>3</sup>Trovillo, Paul Y. *A History of Lie Detection*. Journal of Criminal Law, Criminology and Police Science, 29, 848 - 181; 30, 104 – 119, 1939.

<sup>4</sup> Ibid.

<sup>5</sup> Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph*. JAM Publications; Williamsville, New York, 1996.

It is unclear if these societies understood that the deceptive suspect's fear of being caught in their deception and punished for their crime enervated their sympathetic nervous system. During sympathetic arousal functions not important to survival ceased. Since digesting food was not important to immediate survival, and salivation, whose function is breaking down and lubricating food entering the body, stopped, the mouth became dry.

### **2.3.3 Middle East**

Seven years ago a Middle East student<sup>6</sup> interviewed by this researcher said he recently read a newspaper article about an Egyptian Doctor who described the art of detecting deception by placing a hot metal on a suspect's tongue and subsequently monitoring the tongue for certain deceptive patterns of blistering indicative of deception. The "Trial by Ordeal" test of the dry mouth, obviously still exists.

### **2.3.4 India**

One of the early psychological tests for detecting deception took place in India. It was called the "Test of the Sacred Ass".<sup>7</sup> Priests informed suspects that there existed a Sacred Ass, which had the ability to determine truth from deception when someone pulled its tail. They were told if a truthful suspect pulled its tail, the donkey would remain silent. If a deceptive suspect pulled its tail, the donkey would bray. The suspect would then be sent into the tent alone with the Sacred Ass, instructed to pull its tail. What the suspect was not told was that the tail was covered with lamp black. A truthful person entered the tent and pulled the tail. The donkey may have brayed or remained silent; however, they would exit with soot all over their hands. The deceptive suspect would enter the tent alone and attempt to beat the test. They would remain in the tent briefly with the donkey, but never pulled the tail. Believing if they didn't pull the tail of the donkey it wouldn't bray, and by doing this they could fool the priests. The deceptive suspect exited with clean hands, and was severely punished.

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<sup>6</sup> Cohen, Emanuel. *Interview*. June 27, 1997, Philadelphia, PA.

<sup>7</sup> Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph*. JAM Publications; Williamsville, New York, 1996.

### 2.3.5 United States

In conversations this researcher had with a former Philadelphia, Pennsylvania, police officer<sup>8</sup> this researcher was told of a psychological test used for determining truth during the 1950's. There was a group of Philadelphia Police Detectives known as "West Detectives." They told a suspect to sit in a chair. One detective stood behind the suspect with a thick phone book. Another detective stood in front of the suspect and explained he would ask questions of the suspect and if the suspect lied his partner, who stood behind him, would hit the suspect in the head with the phone book: "It will hurt like hell, but, won't leave any marks!" the suspect was told. The questioning would then begin: "Is your first name Herman?" "Do you live in South Philadelphia?" And then, the detective would ask a relevant question, "Did you shoot John?" and they would see if the suspect suddenly ducked in anticipation of being hit with the phone book. If the suspect did, they knew the suspect was lying. Psychological tests like this still exists.

### 2.4 Trial by torture

Society's attempts to determine truth moved forward to tests of "Trial by Torture"<sup>9</sup>. Perhaps, the most infamous of these tests were performed during the European witch-hunts. The Catholic Church was losing control over its constituents. It felt it needed a scapegoat - a common enemy. Witches met the need, and the Church devised methods to declare a person a witch. A suspected witch could face "Trial by Torture," or confess their wicked ways. Two popular tests existed for suspected witches. The Church claimed witches would not sink in water. Some suspected witches were therefore bound with rocks attached to their body and thrown into a lake or river. If they floated they were found to be a witch and killed. If they sank and drowned their reputation was saved, and they were praised for entering heaven. A second notion presented by the Church was that witches had a spot on their body called "the Devil's Mark"<sup>10</sup> where they were attached to the devil at creation, much like we have a navel where we were attached to our mothers at birth. The Church said these spots were invisible,

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<sup>8</sup> Fleisher, William. *Interview*. January 7, 1995. Philadelphia, PA

<sup>9</sup> Trovillo, Paul Y. (1939) *A History of Lie Detection*. *Journal of Criminal Law, Criminology and Police Science*, 29, 848 - 181; 30, 104 - 119.



but could be discovered by trained examiners, since they were spots that would not bleed. In this test the suspected witch was tied down as the examiner began stabbing her body in search of the Devil's Mark. Of course, the process could end quickly, merely by the suspected witch confessing.

#### **2.4.1 Trial by torture in modern times**

“Trial by Torture” is still the predominant test for truth in the world today. There are many stories about this method of determining truth. For law enforcement, “Trial by Torture,” has both ups and downs: on the upside it results in a 100 percent clearance rate of crimes, however, on the downside they are often cleared by confessions made by innocent people.

#### **2.4.2 South Africa**

This researcher has interviewed a former South African Police Service Officer<sup>11</sup> who alleges there was an interrogation technique, called “tubing” used during the Apartheid Era, which may have resulted in many false confessions. He stated that several admissions regarding the use of this technique were made by officers during the post Apartheid “Truth and Reconciliation Commission Hearings.” Tubing consisted of a suspect being hog tied. An interrogator would then sit on the suspect's back and cover their face with a piece of inner-tube from a tire, so they could not breathe. The tubing would be removed just prior to the suspect passing out, and the process repeated until a confession was obtained.

#### **2.4.3 Middle East**

While teaching in the Middle East this researcher was told by a law enforcement student<sup>12</sup> that suspects have been placed in very small jail cells consisting of four walls and a floor. The room has no furniture. The cell is very hot and periodically filled with water to force prisoners into a crouched position and not allow them to lie down and sleep. Sleep

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<sup>10</sup> Szasz, Thomas S. (1970) *The Manufacture Of Madness*. New York: Harper and Row

<sup>11</sup> Bekker, Daan. *Interview*. February 25, 2004. Pretoria, South Africa.

<sup>12</sup> Confidential Source. *Interview of Anonymous National Police Officer*. September 3, 2003. Riyadh, Saudi Arabia.

deprivation is the key to obtaining a confession. Unfortunately, the test of “Trial by Torture” is still a prominent method of attempting to determine truth used throughout the world.

## **2.5 Trial by peers**

"Trial by Peers," is the judicial method used in most countries around the world today. It consists of a judge and/or jury looking at the case facts, listening to testimony and concluding guilt or innocence. Its success is highly dependent upon the trier of fact's ability to listen to evidence and make an accurate determination of truth. Though usually correct in its outcome, it is by no means one hundred percent accurate.

## **2.6 Trial by instrumentation**

“Trial by Instrumentation,” can be traced back to the 1800's. An Italian physician, Angelo Mosso<sup>13</sup>, was studying blood flow changes in patients. His observation that facial color in people with light colored skin often changed during times of emotional stress in correlation with blood flow changes to the head led him to hypothesize that a suspect lying on a bed, mounted on a fulcrum device (he called the device the “Scientific Cradle,” but it is also commonly referred to as, “Mosso’s Cradle”) could be questioned and examined for deception. If the suspect told a lie, he hypothesized, there would be an emotional imbalance created which would be accompanied by blood flow changes in the body, causing a subsequent change in the suspect’s weight distribution. The Cradle’s movement would then reflect this change in weight distribution caused by the changing blood flow. There is no evidence that this device was ever actually used.

Around the same time period in Italy, Cesare Lombroso, a psychiatrist considered to be the “Father of Modern Criminology”, did use an instrument to detect deception. In the writings of Lombroso, and his daughter<sup>14</sup> they indicate Lombroso used a hydrosphygmomanometer

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<sup>13</sup>Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>14</sup>Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph*. JAM Publications; Williamsville, New York, 1996.

(hydro = water, sphygmo = blood, man = our species, and meter = measure) and later a “volumetric glove,” to view blood volume changes in suspects. In one case, where a child was molested and murdered, Lombrosso placed the suspect’s hand into the device and showed him numerous pictures of young children, one of which was the dead child, as he monitored blood volume changes. He theorized that if the suspect was innocent there would be no dramatic blood volume changes, since all of the pictures would be of children that had no significance to the suspect. However, if the suspect was the perpetrator, upon seeing and recognizing the picture of the murdered child, there would be an emotional change, accompanied by significant blood volume changes.

In 1895, Lombrosso wrote<sup>15</sup>: “It is well known that any emotion that makes the heartbeat to quicken or become slower causes humans to blush or pale. These vasomotor phenomena are entirely beyond our control. If we plunge our hands into the volumetric tank invented by Francis Frank, the level of the liquid registered on the tube will rise and fall at every pulsation. Besides these regular fluctuations, variations may be observed which correspond to every stimulation of the senses, every thought, and above all, every emotion”. His daughter writes: “My father sometimes made successful use of the plethysmograph to discover whether an accused person was guilty of the crime imputed to him, by mentioning it suddenly while his hands were in the plethysmograph or placing a photograph of the victim before his eyes”.

In 1820, Andre’ Ampere<sup>16</sup> constructed an instrument that measured the strength of an unknown electrical current, and named it a galvanometer in honor of an earlier electrical scientist, Luigi Galvani. In 1897, a psychologist, Harold Sticker<sup>17</sup> suggested this device could be used to monitor changes in a suspect’s galvanic skin resistance for the purpose of detecting deception. Sticker believed that “mental excitation” would cause a decrease in the body’s resistance to electricity being introduced by the galvanometer. In 1907, another

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<sup>15</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>16</sup> Travers, Bridgett; Muhr, Jeffrey; Evans, Sarah. *World of Invention Textbook*. Gale Group, 1994.

<sup>17</sup> Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph*. JAM Publications; Williamsville, New York, 1996.

psychologist, S. Veraguth<sup>18</sup>, began using the device in conjunction with word association tests. He coined the term, “psycho-galvanic reflex,” and believed these changes were due to sweat gland activity resulting from emotional changes.

In 1902, a German professor of psychology, William Stern, wrote an article “Die Aussagepsychologie” (the Witness Psychology) hypothesizing that a person’s statement depends on both the cognitive ability of the person, as well as the interviewing process used to obtain the statement. He is considered the “Father of Statement Analysis”, and began the research which has led to the development of Criteria Based Statement Analysis<sup>19</sup>.

Hugo Mustenberg<sup>20</sup>, a Harvard University psychology professor devoted an entire chapter in his 1909 book, "On The Witness Stand," to his concern about perjury usurping the judicial system. He suggested witnesses be attached to instrumentation capable of monitoring breathing, skin temperature, muscle tension, cardiovascular activity, etc., to ensure the testimony given was truthful.

As a result of Mustenberg’s book a student at Harvard published a research paper on “The Discontinuous Blood Pressure Method of Detecting Deception<sup>21</sup>”. William Marston would have a suspect questioned while seated by a curtain. The suspect’s arm was placed through the curtain, and as he was questioned Marston, seated on the other side of the curtain, would periodically monitor his systolic blood pressure using a standard blood pressure cuff and stethoscope. In 1917, he reported above 96 percent accuracy in detecting deception using this method.

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<sup>18</sup> Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph*. JAM Publications; Williamsville, New York, 1996.

<sup>19</sup> Tavor, Daphna. *Lecture conducted on Criteria Based Statement Analysis*. Centurion, South Africa. April 10, 2003.

<sup>20</sup> Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph*. JAM Publications; Williamsville, New York, 1996.

<sup>21</sup> Trovillo, Paul Y. (1939) *A History of Lie Detection*. Journal of Criminal Law, Criminology and Police Science, 29, 848 - 181; 30, 104 - 119.

During the same period, 1914, an Italian scientist, Vittorio Benussi<sup>22</sup>, published a study on breathing patterns indicative of truth and deception. Benussi measured the time it took a person to inhale and exhale. He called this the I:E Ratio. He found that when a person was being truthful the average I:E Ratio was 3:5 (3/8 of a breath involved inhalation, and 5/8 involved exhalation). When a person lied their period of inhalation decreased, and their period of exhalation increased. For example, the classic truthful I:E Ratio of 3:5, changed to a ratio of 2:6. Benussi claimed accuracy rates in detecting deception which exceeded 90 percent.

In 1921, a Berkeley, California (USA) detective, John Larson<sup>23</sup>, at the instructions of Chief of Police August Vollmer, combined a device (Mackenzie Polygraph) being used in Europe with the findings reported by Benussi and Marston. The device allowed Larson to monitor continuous changes in cardiovascular activity and breathing, and was called the Cardio-Pneumo Psychogram. Larson had used a breadboard for the instrument's base, and the new two pen lie detector was nicknamed, "The Breadboard Polygraph." Thus, the Berkeley, California Police Department became the first law enforcement agency in the world with a polygraph to aid them in their criminal investigations.

Larson trained two additional examiners: Clarence Lee, a police officer, and Leonarde Keeler, a summer student working in the police photo lab who became interested in the lie detector.<sup>24</sup> Keeler is considered the, "Father of Modern Polygraph". He later trained John E. Reid, in Chicago. Reid in turn trained Richard O. Arther, and Reid and Arther began studying differences between truthful and deceptive suspects during interviews prior to their polygraph examinations<sup>25</sup>.

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<sup>22</sup> Trovillo, Paul Y. (1939) *A History of Lie Detection*. Journal of Criminal Law, Criminology and Police Science, 29, 848 - 181; 30, 104 - 119.

<sup>23</sup> Ibid.

<sup>24</sup> Ibid.

<sup>25</sup> Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph*. JAM Publications; Williamsville, New York, 1996.

This pretest interview consisted of a structured set of questions the examiner asked, while recording the suspect's verbal and nonverbal behavior. Today, this interview process is called the Behavioral Analysis Interview© (B.A.I.)<sup>26</sup> and is the first structured interview format used for criminal assessments.

## **2.7 Conclusion and summary**

Today, as in the past, the ability of law enforcement agents to conduct professional investigations will be dramatically affected by their ability to determine truth. These investigations are likely to include and depend on the results and caliber of the numerous interviews and interrogations they conduct. The ability to teach law enforcement personnel an accurate method of conducting forensic interviews, which allows them to accurately assess a suspect's truthfulness based on their observations of nonverbal, verbal and written behavior will greatly enhance the investigative process. This research will investigate the reliability of the FAINT interview which is currently being used throughout the world. FAINT integrates nonverbal behavior, projective analysis of unwitting verbal cues and statement analysis to assess a suspect's culpability in a given crime. Next, the nonverbal assessment component of FAINT will be discussed.

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<sup>26</sup> Horvath, Frank S. *Verbal and Nonverbal Cues to Truth and Deception during Polygraph Examinations*. Journal of Police Science and Administration, Volume 1, No.2, 1973.

## CHAPTER 3

### The Nonverbal Assessment Component of the Forensic Assessment Interview Technique (FAINT)

#### 3.1 Introduction

The assessment of nonverbal behavior is one of the components of FAINT considered in the assessment of a suspect. One of the most complete modern texts written on nonverbal behavior indicative of deception is, "Telling Lies<sup>27</sup>," by Paul Eckman, an American researcher. Eckman, is currently in the process of developing a computerized system to evaluate micro facial expressions in an attempt to detect deception. In his book he concludes nonverbal cues can be highly accurate in determining truth and deception. However, he maintains that to effectively interpret them an individual should have a Ph.D. His research, like most of the laboratory studies on nonverbal deceptive behavior fails to generate the emotional intensity present in an actual forensic field interview, and also fails to utilize a structured interview format, as is utilized in the FAINT process. Even without the emotional intensity created by an actual case, a study<sup>28</sup> conducted with nursing students, who were instructed to either tell the truth or lie concerning films they saw, resulted in 78 percent accuracy in detecting deception utilizing nonverbal behavior alone, and the accuracy increased with Criteria Based Content Analysis and Reality Monitoring techniques.

Horvath, a Reid trained polygraph examiner, reported<sup>29</sup> that Reid and Arther found the following nonverbal behavior to be indicative of truth or deception:

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<sup>27</sup> Eckman, Paul. *Telling Lies*. W. W. Norton and Company. New York, NY, 1992

<sup>28</sup> Verj, Aldert; Edward, Katherine; Roberts, Kim; and Bull, Ray. *Detecting Deception via Analysis of Verbal and Nonverbal Behavior*. Journal of Nonverbal Behavior, 24 (4): 239-263, Winter 2000.

<sup>29</sup> Horvath, Frank S. *Verbal and Nonverbal Cues to Truth and Deception during Polygraph Examinations*. Journal of Police Science and Administration, Volume 1, No.2, 1973.

**Table 1 Reid and Arther: Nonverbal behavior indicative of truth and deception**

<b>TRUTHFUL</b>	<b>DECEPTIVE</b>
Genuinely friendly	Over friendly
Direct answers	Evasive answers
Good eye contact	Poor eye contact
Cooperative	Uncooperative
Lighthearted	Scared
Composed	Nervous facial movements
Relaxed	Nervous bodily movements
Talkative	Untalkative
Overall truthful appearance	Overall deceptive appearance

The FAINT<sup>30</sup> structure, which uses a simplified method of interpreting nonverbal behavior, appears to enhance a forensic interviewer's ability to interpret nonverbal cues indicative of truth and deception. Similar to the chart by Reid and Arther, the FAINT overview of nonverbal behavior for the truthful versus deceptive suspect is as follows:

**Table 2 FAINT: Nonverbal behavior indicative of truth and deception**

<b>TRUTHFUL</b>	<b>DECEPTIVE</b>
Relaxed and confident	Tense and defensive
Face to face body alignment	Evasive body alignment
Increased use of illustrators	Use of adaptors
Natural and settled foot and body positions	Tense repetitive, restless foot and body movements

FAINT classifies nonverbal behavior into the following three categories: emblems, illustrators and adaptors:

- Emblems are defined as nonverbal behaviors that speak for themselves. They are very cultural, however extremely accurate as to a person's true communication. For instance, this researcher has observed in many areas of

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<sup>30</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.



South Africa, people showing both thumbs up to communicate their approval of someone or something. The gesture says it all, no words are necessary.

- Illustrators are defined as nonverbal behaviors that help the listener understand the speaker's verbal communication. Nonverbally touching one's chest, saying, "Look at me. I have nothing to hide." as one verbally states, "I didn't do it!" is a sample of an illustrator. If a person is telling the truth verbally, it seems consistent that their nonverbal behavior would assist the listener in understanding the verbal message. FAINT maintains that as illustrators increase from the interviewee's norm, chances of the verbal message being truthful also increases.
- Adaptors are nonverbal gesticulations that do not help the listener understand the speaker's verbal message. They may even interfere with the listener's ability to comprehend what is being said. Someone covering their mouth as they speak is a prime example of an "adaptor". If the verbal communication is a lie, it is in the best interest of the deceiver that the listener not be able to clearly interpret the verbal message. FAINT teaches that as the use of adaptors increases, chances of deception increases.

Nonverbal behavior physically undermines attempts of verbal deception. There are both physiological and psychological processes at the foundation of this category of behavior to explain this. Nonverbal behavior consists of a body of natural, subconscious, and instinctual responses to certain stimuli<sup>31</sup>.

Studies of babies, blind at birth, show that they exhibit the same basic nonverbal behaviors to stimuli as sighted people, proving the innate quality of such behavior. A University of Chicago study<sup>32</sup> asked 12 sighted and 12 blind from birth children to determine how much water was in a glass. When both groups were asked how they determined their answer, both

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<sup>31</sup> Eckman, P. and Friesen, W. V. *Nonverbal Leakage Clues To Deception*. Psychiatry, Volume 31, Number1, pp. 88 – 89, 1969.

<sup>32</sup> Iverson, Jana. *Discover*. Volume 20, Number 3, March, 1999.

used similar gesticulations. The researcher concluded, “The fact that someone who had never seen gestures before would gesture, and sighted children would gesture to a partner they know can’t see, suggests that gesturing and speaking are tightly connected in some very fundamental way in our brains”.

Professor Stuart Campbell, at the Create Health Center for Reproduction and Advanced Technology, pioneered a new scanning technique to view the fetus<sup>33</sup>. To his surprise images clearly showed the fetus yawning, blinking, sucking its fingers and what seemed to be crying and smiling. This clearly shows that facial expressions are not solely environmentally learned.

A Jordanian study<sup>34</sup> demonstrated that lies can be detected by nonverbal cues in Jordanians and Malaysians. They reported that discrimination between lies and truths were clear, but were more accurate for truthful participants than deceptive ones.

Although there appears to be clear evidence that nonverbal behaviors are innate, cultural nonverbal behaviors also exist, demonstrating some gesticulations are also influenced by the learning process.

Charles Darwin observed and reported: “Some actions ordinarily associated through habit with certain states of mind may be partially repressed through the will, and in such cases the muscles, which is least under separate control of the will, are the most liable to act, causing movements that we recognize as expressive. In certain other cases the checking of one habitual movement requires other slight movements and these are similarly expressive.” Darwin observed that fear causes freezing and breathless behavior, accompanied by a violent heartbeat, dilated pupils, catching of the throat, cold sweat, erect hair, yawning, dry mouth, rigid muscles, protruding eyeballs and trembling<sup>35</sup>.

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<sup>33</sup> AFP Worldwide News. September 14, 2003. Paris, France.

<sup>34</sup> Al-Simadi, Fayez A. *Detection of Deceptive Behavior: A Cross-Cultural Test*. Social Behavior and Personality: an international journal, Volume 28, 455-462, 2000.

<sup>35</sup> Darwin, Charles. *The Expression of the Emotions in Man and Animals*. D. Appleton and Company: New York, 1872.

Freud is quoted as stating, “He that has no eyes to see, and ears to hear, may convince himself that no mortal can keep a secret. If his lips are silent, he chatters with his fingertips; betrayal oozes out of him from every pore<sup>36</sup>”.

These physiological changes can be understood by examining the body’s reaction to fear. When the brain perceives a threat, it prepares the body to survive by enervation of the sympathetic nervous system. Sympathetic arousal, also known as the emergency, or “fight or flight” system, through neural and chemical (adrenaline) stimulation causes many physiological changes in the body.

David B. Givens<sup>37</sup>, of the Center for Nonverbal Studies, believes many of these nonverbal behaviors are a psychological attempt to escape the threat: “Apparently trivial self-touch gestures help us calm our nerves. Physical contact with a body part stimulates tactile nerve endings and refocuses our orienting attention inward, away from the stressful events out there”.

In attempting to utilize these recognized changes to assess a suspect's nonverbal behavior the interviewer can divide the body into four separate areas which respond separately, and sometimes differentially:

- general posture
- the head and face
- the arms and hands
- the legs and feet.

All four of these areas address the issue of truthfulness by providing illustrators and adaptors to observe and assess.

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<sup>36</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>37</sup> Givens, David B. *Website for the Center for Nonverbal Studies*.  
<http://members.aol.com/nonverbal2/center.htm#Center20forNonverbal20Studies>.  
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### 3.2 Posture and demeanor

The first thing the FAINT interviewer will score is Posture/Demeanor. After completion of “Personal and Medical Data”, a +1 will be given if posture and demeanor of the interviewee is consistent with truthful behavior, a 0 is given if a difference cannot be discerned, and a -1 if the behavior is considered deceptive.

A study by James<sup>38</sup> in 1932 identified four basic postures:

1. forward lean indicates attentiveness
2. backward lean or turning away indicates refusal or negativity
3. chest expansion indicates pride, conceit or arrogance
4. exaggerated forward lean with head and shoulders down indicates dejection or depression.

Research by Albert Mehrabian<sup>39</sup>, in 1974, was consistent with James’ findings, reaffirming that a forward body lean indicated friendliness, while a backward lean was negative. Additionally, his earlier research (1969) supported the belief that body alignment indicated feelings of liking, while misalignment indicated disliking or disagreement.

Similarly, FAINT maintains truthful people will usually use body position as an illustrator and have an open, settled, upright position. Often they will lean slightly forward, indicating interest in what is being said. Shoulders tend to remain squared, and their body is aligned with the interviewers<sup>40</sup>.

FAINT maintains deceptive people will often show closed and defensive positions, such as crossed arms or legs. They may lean back and/or stretch out their legs, to perceptually

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<sup>38</sup> James, W. (1932). *A Study of the Expression of Bodily Posture*. *Journal of General Psychology*, 405-406.

<sup>39</sup> Mehrabian, Albert. *The Anthropology of Posture*. *Scientific American*, 196, (1957) pp. 122-132.

<sup>40</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

increase the distance between the interviewer and themselves. Many times they assume a position of defeat, with their shoulders forward and their chin on their chest<sup>41</sup>.

Another postural gesture is a sudden shoulder shrug, universally recognized as a sign of uncertainty and submissiveness in children's behavior<sup>42</sup>. Early works in nonverbal behavior, such as the writings of Darwin, considered the "shoulder shrug." He writes: "When a man wishes to show that he cannot do something, or prevent something being done, he often raises with a quick movement both shoulders<sup>43</sup>". During the FAINT interview when an interviewee "shrugs" their shoulders before answering it is assumed the nonverbal response cancels their verbal response since nonverbally they are telling us they do not know the answer. For example, if asked, "How do you feel about being interviewed?" an interviewee "shrugs" before giving an assumed truthful response, such as, "Fine," the positive verbal answer would be negated, and they would receive a score of "0".

If an interviewee's posture appears to be frozen, it may be indicative of fear. This is an interesting phenomenon since we would expect our body's response to fear to prepare us to fight or run. When we consider that there is virtually no animal predator of the human species that humans have the ability to out run or out fight without a weapon, freezing may be the best option for survival. Cleve Backster, a world-renowned polygraphist and innovator, lectured about a third possible body response to fear classified as "freezing," or what he referred to as "holding and hoping<sup>44</sup>". Several other researchers<sup>45</sup> have also shown that

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<sup>41</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>42</sup> McGrew, W. C. "Aspects of Social Development in Nursery School Children with Emphasis on Introduction to the Group." In N. G. Blurton Jones, ed., *Ethological Studies of Child Behaviour*. Cambridge University Press, pp. 129-56, 1972.

<sup>43</sup> Darwin, Charles. *The Expression of the Emotions in Man and Animals*. D. Appleton and Company: New York, 1872.

<sup>44</sup> Backster, Cleve. *Lecture on the Zone of Comparison Technique*. American Polygraph Association Annual Seminar, August 4, 1979. San Diego, CA

<sup>45</sup> LeDoux, Joseph (1996). *The Emotional Brain: The Mysterious Underpinnings of Emotional Life*. New York: Simon & Schuster.

“freezing” is in fact a third option for survival. This may be due to excessive muscle tension caused by the threat, or a reaction caused by the amygdale’s fear center.

Many of the items previously mentioned being of interest to Reid and Arther also fits into this category. We expect a truthful interviewee to be somewhat friendly, cooperative, and settled in their seated body and foot positions. The deceptive interviewee will often have an uncooperative attitude, or appear overly friendly. They may also appear detached or distant.

As the many specific explanations for nonverbal behaviors observed are considered, the interviewer should be alert only to timely change from the suspect's "norm." Proper timing for observation and assessment of these nonverbal areas starts when the interviewer begins to ask the question, until a few seconds after the suspect has answered. During the FAINT interview, nonverbal behaviors classified as adaptors, or indicative of deceptive behavior, will negate a verbal answer that would have been assessed as truthful (+1), resulting in an assessment score of “0”.

One must realize that for the deceptive suspect the pressure of the interview creates an unsolvable problem. Due to sympathetic arousal the body is prepared for fight or flight, but the suspect cannot do either. They must sit there as the interviewer questions them, while this surge of energy takes place. To dissipate some of this nervous energy and to sublimate the problem, they may engage in displacement activities. All of these species' specific behaviors may be indicative of deception<sup>46</sup>, and include:

- finger and foot tapping
- restless body movements
- playing with objects
- swinging of legs
- pulling up socks
- smoothing out clothes
- picking imaginary lint from clothing
- studying the fingernails.

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<sup>46</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

### 3.3 Head and face

Observation of the “Head and Face” begins with head positions<sup>47</sup>. The tilting of the head to the side is an illustrator that suggests cooperation, interest and belief in what is being said. A slight head tilt is therefore indicative of truthfulness, and demonstrates the suspect’s desire to gain rapport.

As the interviewer talks, nodding the head up and down indicates agreement by the interviewee, and nodding from side to side indicates disagreement. Anthropologist, Desmond Morris, in “Body Watching<sup>48</sup>,” asserts that this behavior goes back to birth. Trying to put something unwanted into the baby’s mouth results in resistance by the baby moving his head side to side; the “no” gesture. When being held by the mother, if hungry, the baby raises his head up and down to find the nipple; the “yes” gesture.

Mehrabian’s research supports affirmative head nods are more likely in truthful suspects, finding lower rates of head nodding clearly correlated to deceptive communication<sup>49</sup>.

When the interviewee’s jaw is jutted forward, it indicates hostility or aggression, and if it is on their chest it indicates defeat or depression<sup>50</sup>.

#### 3.3.1 Facial expressions

Facial expressions are the most difficult part of the body to analyze. There are six basic facial emotions<sup>51</sup>:

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<sup>47</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>48</sup> Morris, Desmond. *Body Watching; A Field Guide to the Human Species*. London, Random House Value Publishers, 1985.

<sup>49</sup> Mehrabian, Albert. *Nonverbal Communication*. Chicago, Aldine Atherton, 1972.

<sup>50</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>51</sup> Ibid.

- surprise
- happiness
- fear
- anger
- disgust
- sadness.

People are aware that their facial expressions are easy to observe, and tend to guard them. These expressions also occur at high speeds, and involve the most complex muscularity of any area of the body being assessed. Attempts at masking or hiding bonafide facial expressions may be detected when they are held too long, occur too frequently, the eyebrows are not involved in the expression, and the expression is inappropriate for the matter being discussed. An exaggerated smile is one of the most common facial masks used in an attempt to hide fear. The difference between genuine, spontaneous reactions and masking behavior is the latter does not affect the eyebrows, which normally are involved in a genuine expression. Other common attempts used by suspects to mask include appearing to be surprised, angry or disgusted<sup>52</sup>.

### **3.3.2 Eyes**

The eyes are said to be the windows of the soul. They provide an excellent source of nonverbal feedback. Sudden breaks in eye contact or exaggerated eye contact are highly predicative of deception when occurring consistently and specifically to the relevant questions. For many years this researcher lectured for the University of Delaware on interviewing techniques in the format of a three day seminar for law enforcement and intelligence personnel. On the third day of the seminar we would bring in a convicted felon about to be released on probation to be interviewed in front of the class concerning their experiences being interviewed and interrogated by police. One of the things I would ask them is what they thought a police officer looked for during the interview to determine if they were lying. Almost all of them responded, “If I had poor eye contact.” With this

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<sup>52</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.



preconception of how police determined they were lying, these criminals would attempt to appear to look truthful by never breaking eye contact!

Certain cultures, Zulu<sup>53</sup> and Hispanic<sup>54</sup> for example, teach their young that it is disrespectful to look authority in the eyes. We would therefore expect their eye contact to be poor throughout the interview, resulting in no sudden observable timely changes, and therefore, having no impact on the overall assessment.

Sudden closing of the eyes can indicate an attempt to mentally escape the situation. During a perceived emergency pupils dilate, allowing for better far vision during the threat, and indicating an aroused state. Pupil dilation, when observable, is a good corollary indicator of emotional change. The eyes dilate whenever an individual is aroused or excited<sup>55</sup>. The relationship between pupil dilation and arousal was recognized hundreds of years ago in Italy<sup>56</sup>, where women would take a solution made from the deadly Night Shade plant and use it for eye drops to enlarge their pupils. They believed the enlarged pupils would make them appear more sensual and beautiful. From this practice the drug Belladonna, meaning "beautiful lady," was invented. For hundreds of years Chinese jade merchants wore dark glasses so that other merchants doing business with them could not measure their delight in a particular piece of jade and raise the price<sup>57</sup>. The problem of observation arises with interviewees with dark eyes, since it is difficult to differentiate the pupil from the iris.

Man generally shows two eye whites; one on each side of the pupil. During World War II, the Japanese discovered that when three eye whites (white appearing on both sides of the

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<sup>53</sup> Unknown Participant. *Seminar on Pre-Employment Interviewing*. South African National Defense Force. February, 2001.

<sup>54</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>55</sup> Ibid.

<sup>56</sup> Ibid.

<sup>57</sup> Ibid.

pupil, as well as underneath) appear, it is another excellent indicator of extreme arousal, which they called, San Pak Ku<sup>58</sup>. It was also known as the “eyes of death.”

Squinting suggests distrust, and can occur during a time of emergency to help protect the eye from being struck during a battle<sup>59</sup>. Increased eye blinking can also be a cue to deception. Blinking rates appear to correspond to psychological arousal<sup>60</sup>, with the average blink rate of 20 per minute, each lasting about a quarter second. A Japanese study<sup>61</sup> concluded that blink rate patterns could provide an additional index for the detection of deception. Burgoon concluded that “Deceivers display increased pupil dilation, blinking rates and adaptors, more segments of body behavior, and fewer segments of facial behavior”<sup>62</sup>.

One eyebrow raised is a sign of skepticism<sup>63</sup>. Both eyebrows raised, accompanied by an open mouth indicate surprise. If the eyebrows are pulled up and in with a slightly open mouth it indicates fear. When the eyebrows are pulled down and in, with a tight mouth the emotion is usually anger. Rubbing the eyes appears to send the nonverbal message, “I cannot see it”. If you are talking to a person and they rub their eyes, they are telling you nonverbally they do not see what you are saying. If the gesture occurs as they are talking, they do not want to see what they are saying<sup>64</sup>.

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<sup>58</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>59</sup> Ibid.

<sup>60</sup> Morris, Desmond. 1994. *Naked Ape: A Zoologist Study of the Human Animal*. London, Random House Group.

<sup>61</sup> Fuduka, K. *Eye blinks: new indices for the detection of deception*. International Journal of Psychophysiology, 2001, April; 40(3):239-45.

<sup>62</sup> Burgoon J., Butler D., and Woodall W. *Nonverbal Communication: The Unspoken Dialogue*. New York, Harper and Row, 1989.

<sup>63</sup> Morris, Desmond. 1994. *Naked Ape: A Zoologist Study of the Human Animal*. London, Random House Group.

<sup>64</sup> Brannigan, Christopher, and Humphries, David. “I See What You Mean.” *New Scientist* (Vol. 42), pp. 406- 408, 1969.

### 3.3.3 Mouth

Since digestion and waste elimination are not of primary importance if one is about to die, these systems are inhibited. As a result salivation, which helps break down food and lubricate it for its journey into the body's digestive system is also inhibited, which, as previously stated, results in the classic liar's "dry mouth". This "dry mouth" syndrome may result in numerous observable nonverbal behaviors, such as an increase in swallowing, licking of the lips, clicking noises during speech, a bobbing Adam's apple and white foam (albumin) developing in the corners of the mouth<sup>65</sup>.

Another physiological explanation for some of these behaviors is the amygdale, part of the limbic system, which can be stimulated by emotional arousal and subsequently cause involuntary body movements associated with olfaction and eating<sup>66</sup>. These behaviors include licking, chewing and swallowing. The liar may also experience butterflies in the stomach caused by the sudden cessation of the digestive process, and may also exhibit unusual episodes of burping and belching.

Darwin reported that there was a strong tendency for yawning behavior during fear<sup>67</sup>. Although some have argued that this behavior indicates a physiological need for an increase in oxygen it also carries a strong psychological message of aggression. The lion tamer approaches bravely until the lion yawns, bearing its teeth and sending a message coming closer may result in being bitten. The lion tamer then knows he or she is causing the lion discomfort by the invasion of space, and backs off. Darwin also reported opening of the mouth as a nonverbal sign of surprise<sup>68</sup>.

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<sup>65</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>66</sup> Guyton, Arthur C. *Textbook of Medical Physiology*, 9th edition (Philadelphia: W. B. Saunders, 1996).

<sup>67</sup> Darwin, Charles. *The Expression of the Emotions in Man and Animals*. D. Appleton and Company: New York, 1872.

<sup>68</sup> Ibid.

Lip pursing is a sign of disagreement with what is being said, signaling mental resistance. Tenseness of the lips, biting of the lips, or snarling may occur. Snarling is clearly an aggressive behavior. When the lips are tense they tend to thin out, indicating anger or stress. Biting the lips may be an attempt not to talk or blurt out the truth, or could be a way of self-punishment. Exposing the tongue or biting it can be a gesture indicative of thinking, or a courting gesture for females<sup>69</sup>.

There are also psychological nonverbal adaptor behaviors associated with the face<sup>70</sup>. Throughout our life we are taught that if something foul comes from the mouth: a cough, a sneeze, etc., you place your hand over your mouth to protect others from it. A lie can be something "psychologically foul" coming from the mouth and an unconscious adaptive behavior, easily observable is unconsciously utilized. The deceptive suspect may also place his spread open fingers over his mouth, as if they acted as a sieve, sifting the words passing through them.

Physiologically during "fight/flight" the throat muscles expand to allow more air to be inhaled into the lungs. This increases the amount of oxygen available to the body and may be responsible for the sensation of a "lump in the throat" often experienced with emotional states like fear<sup>71</sup>.

### 3.3.4 Nose

There appears to be a link between deception and the nose. Perhaps it is because the nerve network for emotions, to a large extent, evolved from our neural networks involved in smelling<sup>72</sup>. The sense of smell was primitive man's fundamental survival mechanism.

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<sup>69</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>70</sup> Ibid.

<sup>71</sup> Men's Health Magazine. *Mysteries of Health*. January/February, 2001, p 34.

<sup>72</sup> Willis, William D., Jr. *The Chemical Senses*. Robert M. Berne and Matthew N. Levy (Eds.), *Physiology*. New York, 1998

Touching or pinching the nose is a reliable gesture of disbelief<sup>73</sup>. The nonverbal message appears to be “it stinks.” If you are talking and the listener pinches their nose they are nonverbally communicating they think what you are saying stinks. If they are talking and pinch their nose they think what they are saying stinks.

It appears these hands to face gestures of disbelief as minor acts of self-comfort needed at times of mental conflict. This mental conflict may be associated with the suspect’s inability to voice his opinion that the interviewer is not being truthful, or his own ability to tell the truth and face his punishment. It is my experience that nose running and picking occurs much more often with deceptive interviewees.

### **3.3.5 Blood Flow**

During the emergency the body’s senses are enhanced. Changes in the blood flow to the sensory organs may also physiologically account for itching and tickling sensations resulting in observable nonverbal behaviors, such as touching of the eyes, nose and ears during deception.

These changes in blood flow may also result in facial color changes. A red face generally corresponds to embarrassment and shame, and is not a sign of aggression<sup>74</sup>. When the body is at the height of fear blood flows in deeper vessels, ensuring if the person is cut during the fight they will not bleed to death. This resulting “ghost white” appearance therefore signifies someone who is highly threatened and may attack. This person is experiencing extreme fear<sup>75</sup>.

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<sup>73</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>74</sup> Brannigan, Christopher, and Humphries, David. “I See What You Mean.” *New Scientist*, Volume 42, pp. 406-08, 1969.

<sup>75</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

### 3.4 Arms and hands

The arms and hands provide the best source of nonverbal behavior since they are used frequently as illustrators and adaptors, and hand and arm speed are much slower and easier to observe than micro facial expressions.

A young scared child will run to their parents for protection. The parents hold and rub the child, kinetically telling them everything will be okay. As adults, these learned gestures appear to still serve the same purpose. Rosenfeld<sup>76</sup> demonstrated these hand to body adaptor gestures increase with fear and stress.

The suspect may also use his arms and hands to set up defensive barriers. These barriers are used to establish safe zones around themselves for protective or territorial reasons. In the interview setting, physical barriers such as desks, chairs, or partitions are likely to be unavailable. When inanimate barriers are not available, they may be established by crossed arms or legs, or by outstretched legs<sup>77</sup>.

Arms across the chest may also suggest defiance<sup>78</sup>. The higher the arms, it appears the more defiant the suspect. An exaggerated lean forward with arms crossed, may indicate an antagonistic attitude. These individuals are extremely confident in their ability to resist the interviewer's attempts to ascertain the truth. On the other hand, if there are no other indicators of stress and the suspect has their arms crossed across their stomach, it is more likely an illustrative sign of truthfulness<sup>79</sup>.

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<sup>76</sup> Rosenfeld, Howard. *Nonverbal Reciprocation of Approval: An Experimental Analysis*. Argyle, pp. 63-72, 1973.

<sup>77</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>78</sup> Ibid.

<sup>79</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

Palm down gestures signify the speaker is confident and asserting control<sup>80</sup>. It appears to also universally send a message of calm down, or, may serve to emphasize what the speaker is saying. Palms held out facing another person is a clear sign of disagreement, or an attempt to stop the other person from talking<sup>81</sup>. The position of a person's palm sends clear nonverbal messages even when used to shake hands. If a person shakes your hand keeping the palm of their hand pointed down and your hand on the bottom, palm facing up, it is a sign of their perceived superior position.

If the suspect is pointing away from their body, as they are making a denial (i.e.: "I didn't do it."), subconsciously they may be trying to misdirect the interviewer's attention away from the topic of themselves<sup>82</sup>. This adaptor is comparable to the magician's misdirection or boxer's feint to the side before punching. On the other hand, a suspect who touches their chest as they make a denial is directing the interviewer to look at them; they have nothing to hide. The gesture in this latter instance is an illustrator<sup>83</sup>.

A suspect whose elbows are close to the body suggests that they are under severe tension<sup>84</sup>. This can be associated with protecting one's own body and providing a self reassuring touch. When someone sits with their elbows away from the body it shows they are relaxed, less defensive and more likely to be truthful<sup>85</sup>. Rubbing the back of the neck is a stressful gesture that may reflect deception<sup>86</sup>. Putting both hands behind the head and clasping them is a sign of dominance<sup>87</sup>.

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<sup>80</sup> Givens, David B. *Website for the Center for Nonverbal Studies*.  
<http://members.aol.com/nonverbal2/center.htm#Center%20forNonverbal%20Studies>.  
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<sup>81</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>82</sup> Ibid.

<sup>83</sup> Ibid.

<sup>84</sup> Ibid.

<sup>85</sup> Ibid.

<sup>86</sup> Givens, David B. *Website for the Center for Nonverbal Studies*.  
<http://members.aol.com/nonverbal2/center.htm#Center20forNonverbal20Studies>.  
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### 3.5 Feet and legs

The feet and legs are the least self-monitored areas of the body. They are also the slowest moving of the observable areas of nonverbal behavior. Unfortunately, they are limited in the movements they can generate.

Unsettled foot and leg positions are signs of stress, and as previously stated are indicative of displacement activity<sup>88</sup>. When the legs are in a flight position, especially when pointed to the exit, it is a sign of the suspect's desire to escape. As previously stated, outstretched legs are an attempt to perceptually make the interviewer perceptually appear further away.

People will often rock back and forth, tap, swing their legs, or chew gum in rhythm with their heart rate; approximately seventy-two beats per minute. Maintenance of this rhythm lends security, while stress destroys it. In effect, when the heart rate increases due to sympathetic arousal the interviewer can often observe a sudden corresponding reflexive speed up in the rhythm of the suspect's gestures<sup>89</sup>.

Grooming and courting gestures are due to the arousal of sexual attraction; however, in the investigative setting there is no reason for these behaviors. They may, however, be used by the suspect in an attempt to comfort him or herself, or bias the interviewer in his or her favor. Therefore, women using these gestures, such as making curls with their hair, stroking their hair, or playing with their lips in this environment are exhibiting deceptive behavior. Grooming behaviors for men include fixing their hair, straightening their tie, and hands on hips<sup>90</sup>.

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<sup>87</sup> Morris, Desmond. *Naked Ape A Zoologist Study of the Human Animal*. Vinatge/Ebury, a division of Random House Group, London, 1994.

<sup>88</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>89</sup> Ibid.

<sup>90</sup> Ibid.



### **3.6 Paralinguistic behavior**

Paralinguistic behaviors, the manner in which one speaks to communicate particular meanings, such as pitch and speed changes, may also assist us in the assessment of truth. Truth flows from the tongue, and is very easy to display. Cognitively, the lie requires much more mental activity: “Should I lie?” “What should I say?” “Will it contradict something I already said?” “Will it be something they can investigate and discover was untruthful?” “What will happen if I am caught lying?” Therefore, a suspect who suddenly displays response latency may be attempting deception. The suspect may attempt to “buy time” and hide their latency by asking the interviewer to repeat the question, or by repeating the question themselves. Other paralinguistic behaviors generally associated with deception are stumbling over words and higher vocal pitch during emotional arousal<sup>91</sup>. Any of these behaviors will also negate a positive verbal response and result in a score of “0”.

### **3.7 Neurolinguistic behavior**

Neurolinguistics, relation between language and the structure and function of the nervous system is a relatively new field in psychology, which may give the interviewer two additional advantages<sup>92</sup>. Neurolinguistic factors explain the probable link between eye movement and the brain's language processing mechanisms. This explanation distinguishes among the idea and information processing modes through which we function and that each of us has preferences in the way in which we process information. The three primary modes of processing information are:

- visual
- auditory
- kinesthetic.

For example, when a person attempts to discern a faint sound they generally look towards the ear closest to the sound. After responding a few hundred thousand times the individual

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<sup>91</sup> Goleman, Daniel (1997). "Laugh and Your Computer Will Laugh With You, Someday." In *New York Times* (Jan. 7), C1, C9.

<sup>92</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

becomes programmed to looking towards their ear when trying to hear or remember a sound. The same thing occurs with vision and kinesics. A person will survey a picture by moving their eyes up and across the picture to register its composition, colors and size. Again, once the individual does this a few hundred thousand times, it too becomes programmed into the individual's psycho-motor pathways. Kinesis thinkers are programmed by looking down to their abdomens when the butterflies of nervousness and fear are present.

### **3.7.1 Rapport**

Though everyone does process in all three modes, each person has a preferred mode. With careful observation, the information about someone's preferred mode of processing can simplify the process of gaining rapport with the suspect by enabling the interviewer to frame comments and questions in that mode. The corollary feature is that eye movement during communication becomes another illustrator/adaptor to be observed<sup>93</sup>.

To ascertain the suspect's neurolinguistic frame, the interviewer must observe eye movement. In the Visual Processing Mode the eyes are looking up to the right or left. In the Auditory Processing Mode the eyes are horizontally looking right or left. In the Kinesthetic Processing Mode, stimuli are generated within the body itself.

### **3.7.2 Dominant mode**

The interviewer can identify the suspect's dominant mode by observing eye movements and determining whether they fit the category of visual, auditory or kinesthetic. An interviewer can also listen carefully and identify a person's mode of preference by the suspect's language. An interviewee who asks, "Can't you *see* what I mean", is linguistically signaling they prefer the visual mode. That allows the interviewer to adapt to the perceptual mode by wording questions and responses more effectively, "I *see* what you're saying," "Do you *see* my point?" If the suspect prefers the auditory mode, the interviewer might say, "*Listen* to what I'm *saying!*" "*Hear* the case facts that might show you are involved!" If the interviewee's eye movement suggests a kinesthetic processing mode, the interviewer could say, "I think you

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<sup>93</sup> Niederhofer, Janice. Lecture on *Neurolinguistic Programming*. American Polygraph Association Lecture, 36<sup>th</sup> Annual Seminar, August 6, 2001, Indianapolis, Indiana.

feel bad about what happened. Can you *get a handle* on what happened? I want your *sense* of the events."

### 3.7.3 Recall versus construction

Another advantage in identifying the suspect's neurolinguistic mode is to confirm that there is agreement between the processing mode and the mode applicable to the question. If mode expectation and mode demonstration, which is that which is anticipated and what is actually observed, are not in agreement, then something is wrong and the interviewer should be alerted<sup>94</sup>.

Eyes to the right in the visual or auditory mode indicates the suspect is "constructing", and eyes to the left indicate he or she is using "recall"<sup>95</sup>. Thus, if the interviewer asks a question, which requires visual recall (eyes up and to the left), and the suspect enters a construction mode (eyes up and to the right) mode instead, there is a good chance they are either editing information or fabricating their answer.

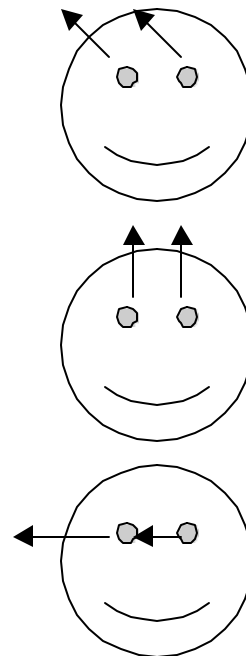
**Table 3** Neurolinguistic eye cues

Eye cues not indicative of memory:

Visual Constructed: eyes up and to the speaker's right indicates they are creating or adding information to something they are attempting to visualize.

Hail Mary: eyes looking straight up indicates someone seeking divine help. This eye positioning is not consistent with memory.

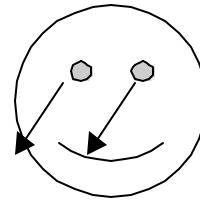
Auditory Constructed: eyes to the speaker's right indicates they are in an auditory mode, however they are creating or adding information to something they have not heard.



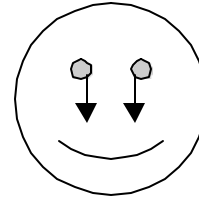
<sup>94</sup> Niederhofer, Janice. *Neurolinguistic Programming*. American Polygraph Association Lecture, 36<sup>th</sup> Annual Seminar, August 6, 2001, Indianapolis, Indiana.

<sup>95</sup> Ibid.

Kinesthetic: Speaker's eyes down and to their right are indicative of someone experiencing body sensations. It is not indicative of recall, but someone experiencing emotions. During an interrogation it may indicate the person is close to confessing.

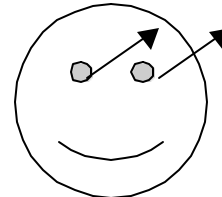


Person's eyes focused straight down are indicative that the person cannot recall information.

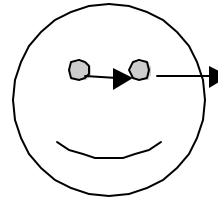


### Eye cues indicative of memory:

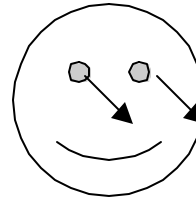
Visual Remembered: eyes up and to the speaker's left indicates they are looking for a picture already seen.



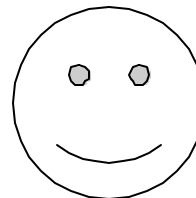
Auditory Remembered: eyes to the speaker's left indicate they are in an auditory mode trying to hear sounds previously heard.



Auditory Digital: eyes down and to the speaker's left indicates they are talking to themselves.



Defocused: If the person's eyes are staring straight ahead, apparently not focused on anything, it indicates they are seeing a bunch of visual information at the same time.



## 3.8 Conclusion and summary

The application of nonverbal behavior to the assessment interview will be to negate a positive verbal answer during the FAINT interview. These negative nonverbal behaviors will include timely adaptors, unnecessary thought gestures, paralinguistic behaviors associated with deception and neurolinguistic signs of construction. All of these aspects can be utilized to construct a tentative/hypothetical model indicating deception.

Next attention will be focused on analyzing unwitting verbal cues.

## **CHAPTER 4**

### **Analysis of Unwitting Verbal Cues Component of the Forensic Assessment Interview Technique (FAINT)**

#### **4.1 Introduction**

The analysis of unwitting verbal cues examines the basic differences between how truthful and deceptive suspects answer questions presented in the structured FAINT interview. This assessment is made through the presentation of a series of relevant, comparison and protective questions.

#### **4.2 Relevant questions**

Relevant questions deal with the matter under investigation. They are questions that solve a piece of the puzzle. Each question deals with a single issue, and should be short and direct. These questions must be formulated so that the innocent can answer them truthfully, while the guilty are forced to lie. As such, these questions threaten the deceptive person, and cause sympathetic arousal to occur. These questions cannot imply guilt, or infer the interviewer has already reached the conclusion the suspect is guilty.

##### **4.2.1 Strong relevant questions**

Strong relevant questions deal with direct involvement. Samples of these questions are:

- Did you commit that crime?
- Did you start that fire?
- Did you take that missing money from the safe?
- Did you force that woman to have sex?
- Did you shoot that man?

### **4.2.2 Medium relevant questions**

Medium relevant questions concern issues of secondary involvement, such as:

- Did you conspire with anyone to commit that crime?
- Were you present when that crime took place?
- Did you help anyone commit that crime?
- Did you plan with anyone to commit that crime?
- Do you know for sure who committed that crime?
- Did you see who committed that crime?
- Did anyone tell you who committed that crime?

### **4.2.3 Rules for relevant question construction**

Relevant questions should be as short and focused as possible. The interviewer must make sure that the suspect understands the language. Relevant questions should not contain words that are legalistic, such as, burglarize, extort, bribe, rob, etc. Legal language can be ambiguous and allow the guilty interviewee to hide behind a rationalization (e.g. "I didn't take a bribe; I accepted pay for a special job" "I didn't burglarize the house, the door was unlocked; I just stole the contents").

The interviewer should avoid emotional language, which may cue responses, regardless of whether the person is lying or telling the truth. The interviewer should also avoid charged words such as "kill," "rape," "steal," that in themselves may make interviewees uncomfortable and by their usage alone elicit a response.

The language used should focus the relevant question on the act itself, rather than language that connotes guilt and innocence. Questions framed around guilt and innocence may allow the suspect to rationalize or personally code the issue. If asked, "Did you steal that missing money from your employer?" The guilty suspect could rationalize that he or she is telling the truth when they answer, "No," because they were promised a raise at the beginning of the year that they never received. Their mental agility may permit them to rationalize they didn't "steal" it, the company owed it to them. To prevent the perpetrator this mode of diminishing

their threat to the question, it is much more effective for the interviewer to focus on the physical act by asking, "Did you remove any of that money your company reported missing?"

In a case where a 4 year old girl accused her care taker of putting a finger in her vagina, the care taker came out truthful on a polygraph examination when asked, "Did you put your finger in that little girl's vagina?" When retested, and asked the exact same question she failed the test. The difference between the two examinations was one question in the second interview. In the second instance where this researcher was the interviewer the caretaker was asked why the little girl would make such an allegation if it were not true. The caretaker asked if that meant whether the alleged victim was angry with her because she punished her. In the second test when this researcher reviewed the test question, he explained he was not asking her why (sexual or punishment) her finger would have been placed in the little girl, only whether it was ever done. This was the difference that changed the result. The actual facts of the case turned out to be that the little girl refused to eat her vegetables. As punishment, the caretaker pulled her panties down and jammed her finger into her vagina. She passed the first polygraph examination by "personally coding" what the test issue was about. She redefined the crime from act (finger in vagina) to motive (sexual touching). By telling herself she was being tested about the latter, which was not the case, she came out truthful. When this researcher explained the question in terms of the "physical act," her mental escape at deception was denied her.

In homicides, the interviewer should avoid the question, "Did you cause the death of (victim)?" especially if the suspect had some type of relationship with the deceased. In re-interviewing an innocent man, who failed a polygraph test when asked, "Did you cause the death of your daughter", this researcher inquired as to what he had thought about when asked the question; how he had registered a positive for lying. He said he thought he had caused her death since he felt he was responsible for it by not being there when he was needed. She was four years old and taken from his house during the night. She was found sexually molested, and beaten to death the next morning. He explained that as her father, he should have been able to protect her. He felt it was his failure, his fault that his daughter had been killed. When asked on a reexamination, if he beat her to death, he answered "No", and the polygraph confirmed his innocence.



It should be evident that questions worded “cause the death of” may confuse guilt and responsibility, and is open to a wide range of interpretations. The suspect can internalize guilt without being the perpetrator or directly involved. A suspect can feel responsible and yet have acted to protect. Consider this hypothetical situation: A boyfriend and girlfriend had a fight. She got out of the car and walked away. The boyfriend left in anger but came back for her, didn't find her and went home. Later he found that on her way home she was raped and murdered. How would the boyfriend feel? Did he see himself as responsible? Did he feel guilty about his behavior? If he had not given in to his anger, she would not have gotten out of the car and she would still be alive.

The interviewer must make sure he or she deals with only one issue and aspect of the crime at a time. Imagine if the victim above had been raped by one perpetrator, but killed by an accomplice. The complex relevant question, "Did you rape and kill . . .," could be successfully denied by both, thus raising a second instance of ambiguity. Many of the psychological theories used in the art of polygraph were introduced in the 1960's by Cleve Backster<sup>96</sup>. Backster identified “Psychological Set” as a person’s mentally focusing on those questions which hold the greatest immediate threat to their general well being. This theory maintains that the guilty suspect could fail to leak deceptive behavior to what is perceived as the lesser crime, because they are waiting to be asked about the more threatening one. In a multiple issue crime, questioning should focus on the most serious act first. Backster labeled this “Anti-Climatic Dampening<sup>97</sup>,” which also explains why the deceptive suspect reacts more strongly to the relevant question than to the comparison question, even though he is lying to both.

In all cases, extensive preparation for the interview may mean the difference between success and failure. Since relevant questions are meant to force the guilty party to lie, the interviewer needs to know as much about the crime and the suspect as possible. That will enable the questions to be well framed and clearly focused. Such questions generate the tensions that most threaten the guilty suspect and cause psychophysiological changes to occur. Thus, the

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<sup>96</sup> Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph*. JAM Publications; Williamsville, New York, 1996.

<sup>97</sup> Ibid.

more known about the crime, the better prepared the interviewer will be, and the more productive the interview.

### **4.3 Comparison questions**

Comparison questions create the environment for properly identifying truthful suspects. They were introduced by John E. Reid<sup>98</sup> in the 1940's to offer a threat to innocent suspects, and thereby assist in identifying them as truthful during polygraph examinations. These questions are broad in scope and deal with issues similar, but less threatening than the relevant issue. They are questions one would expect everyone to truthfully answer, "Yes." In reality, they threaten truthful suspects, by creating a conflict as whether or not to lie to them. To get an understanding of how Comparison questions work, imagine how most people would truthfully answer each of these sample comparison questions:

#### **4.3.1 General comparisons**

- In your entire life, did you ever tell a lie to get out of trouble?
- In your entire life, did you ever do anything for which you could be arrested?

#### **4.3.2 Theft comparisons**

- Prior to working for your current employer, did you ever steal anything from a job?
- In your entire life, did you ever steal anything?
- In your entire life, did you ever steal from someone who trusted you?
- In your entire life, did you ever cheat?

#### **4.3.3 Arson comparisons:**

- In your entire life, did you ever deliberately damage anything?

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<sup>98</sup> Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph*. JAM Publications; Williamsville, New York, 1966.

- During the first 19 years of your life, did you ever play with matches?

#### **4.3.4 Homicide comparisons:**

- During the first 22 years of your life, did you ever go out of your way to get even with anyone?
- Between the ages of 19 and 23, did you ever lose your temper?

#### **4.3.5 Sex comparisons :**

- During the first 20 years of your life, did you ever have an unusual sexual fantasy?
- In your entire life, did you ever masturbate?
- In your entire life, did you ever lie about a sexual matter?

All or most of these questions would be answered "Yes," by a suspect telling the truth. However, during the FAINT interview almost every truthful suspect will hedge or answer them "No."

#### **4.3.6 Dynamics of comparison questions**

To understand the dynamics involved with this area of "Comparison" questioning, assume that an innocent suspect is being interviewed concerning the theft of ten thousand dollars from the safe in the office where he or she works. The relevant question might be, "Yesterday, did you remove that missing safe money?" They did not take the money, so they answer, "No." Obviously, since they are a suspect, although they answered truthfully, this question still may hold some stigma or threat – no one likes to be the “accused”. Now the interviewer asks, "What type of person would steal ten thousand dollars from his employer? This is the act of a thief. An honest person does not wake up one day, and just steal money. This is a person that has stolen from other jobs and from people who trusted him through out his life. That is the kind of person that would do this. This is the type of person that even if they did not take the missing safe money, should not be in a sensitive position like yours. That is why I would like to know, in your entire life, did you ever steal anything?"

If this was the person who took the ten thousand dollars, they would not be concerned about this line of inquiry. They are there about the ten thousand dollars they took. They feel guilty about the ten thousand dollars they took. They may go to jail for the ten thousand dollars they took. Being asked about ever stealing anything else seems psychologically unimportant to them under the immediate circumstances.

However, this suspect is innocent. Think about what is going through his or her mind as they are asked the comparison questions. They are in conflict. What should they do? Lie or tell the truth? If they lie, will they be caught? If caught, will the interviewer think they took the ten thousand dollars? What if they tell the truth? Will the interviewer still think they are the type of person that would steal the ten thousand dollars now that they have admitted they took fifty cents from their mother's purse, or ate a candy bar without paying for it at their last job?

It is important to understand that at sometime in their lives almost all individuals have stolen something, lied about something important to someone who trusted them, cheated someone, deliberately hurt someone, or did some other act of which they are thoroughly ashamed. Committing these minor transgressions are the experiments with the rules by which many of us learn to become responsible members of the community, and is an integral part of our socialization. We are testing our social parameters, learning a sense of remorse or guilt, and usually growing into better human beings. However, this experimental anti-social behavior is something we are very reluctant to discuss with other people, let alone a stranger investigating a crime.

Which question would bother an innocent suspect more, the relevant or comparison? Obviously, the comparison question holds a greater threat for the innocent because they are being asked to admit to something they actually did. They didn't do the act under investigation, so the relevant questions represent no threat.

#### **4.4 Projective questions**

In addition to relevant and comparison questions, the FAINT Interview utilizes projective questions. Projective questions are used to elicit the suspect's unwitting verbal cues. Projective questions may be open or closed ended, but they must be focused on the matter under investigation. These questions require the suspect to give a response outcome based on their own degree of culpability.

Truthful and deceptive suspects have a very fundamental difference in their attitude toward the investigation and its results. The truthful suspect wants the interviewer to be successful. They want the interviewer to find the truth, that they did not commit nor were they wittingly involved in the matter under investigation. The deceptive suspect wants the interviewer to fail. They want the truth to remain hidden, to create the illusion that they did not commit and/or was not involved<sup>99</sup>. Projective Questions are designed to draw out these differences. When a suspect is asked to tell who they suspect of doing the crime, the innocent suspect will give names in an attempt to assist and narrow the investigation. The perpetrator usually will not.

The interviewer must ask each suspect exactly the same mix of questions, in exactly the same sequence. These precise and parallel interviews are the only framework within which the individual verbal responses can be compared and reliably analyzed.

#### **4.4.1 Behavioral Analysis Interview (B.A.I.)**

A study published on the Reid Behavioral Analysis Interview (B.A.I.) method used the following fifteen questions to analyze verbal and nonverbal behavior to identify truthful from deceptive suspects<sup>100</sup>:

1. What is the purpose of this interview today?
2. If you did this you should tell me now. Did you do it?

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<sup>99</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

<sup>100</sup> Horvath, Frank; Jayne, Brian and Buckley, Joseph. *Differentiation of Truthful and Deceptive Criminal Suspects in Behavior Analysis Interviews*. *Journal of Forensic Sciences*, JFSCA, Volume 39, Number 3, pp. 793-807, May, 1994.

3. Do you know who did it?
4. Who do you suspect of doing it?
5. Is there anyone you could vouch for, who you do not think would be involved?
6. Who would have had the best opportunity to do this if they wanted to?
7. Do you think this was done deliberately?
8. How do you feel about being interviewed?
9. How do you think the investigation will turn out on you?
10. Have you ever thought about doing this?
11. What do you think should happen to the person who did this?
12. Do you think the person should get a second chance?
13. Tell me why you wouldn't do something like this?
14. Why do you think someone would do something like this?
15. Have you told anyone about coming in for the interview today?

Four blind evaluators in that study assessed the suspect's attitude, posture (closed, uncomfortable and rigid/frozen being signs of deception) and verbal responses. The accuracy of the evaluators for truthful suspects was 78 percent truthful, 5 percent deceptive and 17 percent inconclusive. The accuracy for deceptive suspects was 66 percent deceptive, 17 percent truthful and 17 percent inconclusive. Excluding inconclusive results, their average accuracy was 91 percent for truthful suspects and 80 percent for deceptive suspects.<sup>101</sup>

#### **4.4.2 Forensic Assessment Interview Technique (FAINT)**

To allow for comparisons between the accuracy indicated in this BAI study and the accuracy of this study on the validity of FAINT, four blind evaluators were also utilized. The FAINT interview built upon many of the questions and concepts of Reid's BAI interview. In essence truthful and deceptive suspects differ in the following ways<sup>102</sup>.

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<sup>101</sup> Horvath, Frank; Jayne, Brian and Buckley, Joseph. *Differentiation of Truthful and Deceptive Criminal Suspects in Behavior Analysis Interviews*. Journal of Forensic Sciences, JFSCA, Volume 39, Number 3, pp. 793-807, May 1994.

**Table 4 Projective analysis of unwitting verbal cues**

<b>TRUTHFUL</b>	<b>DECEPTIVE</b>
Wants the truth known	Wants the truth hidden
Talkative	Non-talkative
Tries to narrow/assist investigation	No information to offer, or broadens investigation
Uses appropriate and strong terms	Uses mild and evasive terms
Expresses real feelings	Appears detached and distant
Admits the opportunity	Denies the opportunity/sweeping declarations to exclude self
Argues actual innocence	Argues legal innocence
No use of “personal coding”	Uses “personal coding”
Consistent “how and why”	Changes “how and why”

Due to these fundamental differences, FAINT maintains truthful and deceptive suspects will differ in how they answer them. The following are the questions asked during a FAINT interview and the expected differences between truthful and deceptive suspects:

1. How do you like your job? (Used for assessment in employee cases only)  
Truthful: Generally have favorable opinion.

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<sup>102</sup> Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

Deceptive: Evades question or has a negative opinion.

Discussion: There is a psychological concept of “cognitive dissonance,” which maintains that we cannot have two opposing thoughts in our mind without an attitudinal change taking place. You cannot hate apples, and be eating an apple which you find very enjoyable, without an attitudinal change taking place. You cannot believe you have a good employer and job, and steal or commit deviant acts against your employer, without an attitudinal change taking place. That change will generally involve negative perceptions of the employer and job.

2. Finish this sentence for me, this interview and investigation is about.....what?

Truthful: Respond quickly using appropriate and strong language to describe the crime.

Deceptive: Slow in responding; use soft terminology which often would give you no insight into the crime that took place (i.e.: “To see if I’m telling the truth.”).

3. Why were you selected to be interviewed?

Truthful: Will use appropriate and strong terms identifying the reason (crime), and often admit they had the opportunity to have committed the crime.

Deceptive: Often are unsure of the reason, will use mild terms to describe the crime, or make general statements, like, “Everyone is.”

4. How do you feel about being interviewed?

Truthful: May admit some general nervousness, but show a positive attitude about the investigation and their desire to see the matter resolved. They may even state that they did commit the crime during their response.

Deceptive: Often express hostility toward the process, or demonstrate a negative and uncooperative attitude.

5. Please write in detail what this is about and how you would explain it.



Truthful: If you knew nothing about the crime, after reading their answer you would know exactly what happened, and be able to formulate direct relevant questions concerning the issue to be resolved. You can also apply the principles of Scientific Content Analysis (SCAN) to this answer for a more in-depth determination of truth or deception.

Deceptive: Generally writes very little, often omitting information that would allow you to understand exactly what took place, or to formulate direct relevant questions about the issue under investigation.

6. If you were the investigator, how would you conduct the investigation?

Truthful: Gives constructive information on how to solve the crime, since that will clear them of any wrongdoing.

Deceptive: Cannot offer valid suggestions since it would assist in identifying them as the perpetrator.

7. What are the five most important causes that created this situation?

Truthful: Gives answers that project their negative feelings toward the perpetrator, such as greed, they're sick, a thief.

Deceptive: Often cannot answer the question, or will personalize their answer, such as they needed money for bills, or they took the car because they were tired of taking the bus.

8. Did you ever think about doing something like this?

Truthful: Usually quickly deny such thoughts.

Deceptive: Hesitant in their denial, or make statements like, "Everyone thinks about it, but I'd never do it."

9. During the first \_\_ years of your life, did you ever\_\_\_\_\_? (COMPARISON)

Truthful: Threatened by the question and shows concern, response latency, repeat question, use "hedge" words or other evasive tactics in answering.

Deceptive: Quick response, unconcerned about the question.

10. Did you do the crime?

Truthful: Quick response, unconcerned about question.

Deceptive: Threatened by the question and shows concern, response latency, repeat question, uses “hedge” words or other evasive tactics in answering.

11. During the first \_\_ years of your life, did you ever \_\_\_\_\_? (COMPARISON)

Truthful: Threatened by the question and shows concern, response latency, repeat question, uses “hedge” words or other evasive tactics in answering.

Deceptive: Quick response, unconcerned about the question.

12. Whatever you tell me is confidential, and it doesn’t mean you are right, but if you had to suspect someone, who would you suspect?

Truthful: Hesitant, but usually gives a name, coming from an assisting and narrowing mode.

Deceptive: No information, or indicates it could have been anyone, coming from a broadening mode.

13. Other than yourself, who would you eliminate from the investigation, who would you say definitely didn’t do this?

Truthful: Attempt to assist the investigation by naming someone and narrowing the investigation.

Deceptive: Usually doesn’t know the people well enough to eliminate anyone, or will vouch for everyone.

14. What do you think should happen to the person who did this when we identify them?

Truthful: Usually describes harsh, appropriate punishment.

Deceptive: Since you are asking them to tell you what their punishment should be, they will often evade the question by saying it is not their responsibility to make that decision, or pass it to someone else (“that’s the owner’s decision), or will give an evasive answer (“It depends on why they did it?”).

15. Would you give them a second chance?

Truthful: Almost always answers, “No,” and sometimes will use strong terms to describe the perpetrator (“Once a thief, always a thief!”).

Deceptive: Often will consider a second chance (“I believe everyone deserves a second chance”).

16. We will be doing a thorough investigation. We will be interviewing everyone, and doing forensic tests. How do you think the investigation will turn out concerning you, and whether you did this?

Truthful: They will quickly and emphatically state it will clear them, and may state, “Because I didn’t do it.”

Deceptive: May repeat the question, show response latency, ask what type of forensic tests will be done, or answer with “hedge words,” like “I hope,” or “I pray it will come out good.”

17. Would there be any reason evidence would turn up indicating you did this?

Truthful: Quickly rule out this possibility, unless there is a valid reason (i.e.: they touch the safe the money was stolen from as part of their job).

Deceptive: Slow and unsure in their answer, or may offer a weak excuse why.

18. If the company (person) was willing to drop the investigation if we could recover the loss (you paid her hospital bill) would you be willing to chip in (pay)?

Truthful: Usually will refuse to pay for something they did not do and expresses their desire to have the perpetrator caught.

Deceptive: May agree, since it means the investigation will be dropped and they will go undiscovered and unpunished, or may use weak phrases in their refusal to pay, such as, “I can’t pay it all back,” or “I can’t afford to.”

19. Did you tell anybody about what happened and that you were going to be interviewed about it?

Truthful: This is a major event in their life and they will usually have discussed it with family and friends.

Deceptive: Often will not tell anyone about it because they project they will not do well in the investigation and will be asked later by anyone they inform

about how they did.

20. Do you think this was deliberate (i.e.: stolen) or accidental (i.e.: lost)?  
Truthful: Usually believe a crime took place.  
Deceptive: If they can convince you no crime took place they are “home free,” and therefore they often take the position that no crime took place.
21. Is there anything you think is important I didn’t ask you about?  
Truthful: May offer information.  
Deceptive: Rarely offers information.
22. In your entire life did you ever lie to get out of trouble? (Comparison)  
Truthful: Threatened by the question and shows concern, response latency, repeats question, uses “hedge” words or other evasive tactics in answering.  
Deceptive: Quick response, unconcerned about the question.
23. Did you lie to me about whether you did this?  
Truthful: Quick response, unconcerned about the question.  
Deceptive: Threatened by the question and shows concern, response latency, repeats question, uses “hedge” words or other evasive tactics in answering.
24. If you were the investigator, and had three questions to ask to have resolved this problem, what would you have asked?  
Truthful: Will name three strong relevant questions  
Deceptive: Will avoid strong relevant questions that would solve the crime.
25. If I need to speak to you again, would you have any problem returning?  
Truthful: Quickly agree to come back.

Deceptive: May appear surprised the interview is over, and may agree to return, but not too enthusiastic about it, or be skeptical about returning.

26. How do you feel now that the interview is over? (SCAN: "After Interview-Interview")

Truthful: Usually feels the same as before.

Deceptive: Often expresses relief.

26a. Should I believe your answer about whether you did this?

Interviewee must answer this question "Yes," and then make one of the following three statements to any of the remaining questions to be indicative of truth: "I told the truth," "I didn't lie," or, "I didn't do the crime."

26b. If yes, give me one reason why I should believe you.

26c. What would you say if the investigation proves beyond any doubt you did this?

26d. What were your emotions during the interview, how did you feel?

26e. Were you afraid?

26f. If you were asked to pay for \_\_\_\_\_, how much would you pay?

#### **4.5 Conclusion and summary:**

The analysis of unwitting verbal cues during the FAINT interview offers valuable information. The accuracy and usefulness of this information is magnified when its veracity is scrutinized by observations of illustrative nonverbal behaviors, indicative of truthfulness, or adaptive nonverbal behaviors, indicative of deception. The strength of this procedure is not in its isolated components, but in the totality of the process.

Next attention will be focused on statement analysis, the final component of FAINT.

## CHAPTER 5

### Statement analysis component of the Forensic Assessment Interview Technique (FAINT)

#### 5.1 Introduction

There are two basic systems utilized today to evaluate a statement: Criterion Based Content Analysis (CBCA)<sup>103</sup> and Scientific Content Analysis (SCAN)<sup>104</sup>. Although the primary system used in FAINT is SCAN, a review of CBCA is given since it is the predecessor.

#### 5.2 Criterion Based Content Analysis

CBCA, developed from theories of witness psychology, originated in the 1900 work of Binet: “La Suggestibilité” (The Suggestibility), the 1902 work of William Stern: “Die Aussagepsychologie” (“The Witness Psychology), and the previously mentioned 1909 work of Hugo Münsterberg: “On The Witness Stand”<sup>105</sup>.

William Stern (1871- 1938), one of the major psychologists involved in personality and developmental psychology in Germany, published an untitled article in 1904, “The Testimony is an Intellectual and an Audition Product.” This title accurately describes the concept of

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<sup>103</sup> Steller, Max. Assessing Credibility of Children's Statements About Sexual Abuse, *the Institute of Forensic Sciences, Istanbul University on June 29, 2000*

<sup>104</sup> Lesce, Tony. *SCAN: Deception Detection by Scientific Content Analysis*. Law and Order Magazine, Vol. 38 No. 8, August 1990.

<sup>105</sup> Tavor, Daphna. *Lecture conducted on Criteria Based Statement Analysis*. Centurion, South Africa, April 10, 2003.

witness psychology, which maintains that “testimony” is a performance that depends not only on personal characteristics, but also on characteristics of the situation in which the statement was given<sup>106</sup>.

In 1967, Udo Undeutsch, a Professor of Psychology in Germany, formulated a working hypothesis for evaluating the credibility of testimony<sup>107</sup>. This “Undeutsch Hypothesis” (named by Max Steller in 1989) stipulates that descriptions of real memories differ qualitatively from fabricated testimonies.

This difference is based on the supposition that a fabricated statement demands a greater cognitive effort, greater creativity and also a great deal of self-control. Therefore, the statement not based on real experience will be less elaborated than a statement based on real recollection. This hypothesis gave a new foundation for the research and verification of criteria that can differentiate a true statement from a fabricated one<sup>108</sup>.

Forensic psychologists in parts of Europe (Germany and Switzerland) are charged by the courts to give expert opinions about the credibility of statements. The forensic psychologist’s task is to objectively evaluate the quality of the testimony. This process was originally created to determine the credibility of the child witness, however it is currently used to analyze the statements of adult witnesses and victims too.

The German Supreme Court, in 1999, gave a standard for analyzing a given statement. One of the things the expert has to consider is the “Zero Hypothesis<sup>109</sup>”, which makes the assumption that the statement is not truthful, until one finds enough indicators to prove

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<sup>106</sup> Ibid.

<sup>107</sup> Steller, Max. *Assessing Credibility of Children's Statements About Sexual Abuse*. Institute of Forensic Sciences, Istanbul University on June 29, 2000

<sup>108</sup> Tavor, Daphna. *Lecture conducted on Criteria Based Statement Analysis*. Centurion, South Africa, April 10, 2003.

<sup>109</sup> Steller, Max. *Assessing Credibility of Children's Statements About Sexual Abuse*. Institute of Forensic Sciences, Istanbul University on June 29, 2000.

differently. In that case, the forensic psychologist has to accept the alternative hypothesis, that the victim's statement is based on real experience.

The analyzation must be performed in a systematic manner. The assessment of a statement made of long sequences and spontaneously, without interruptions by questioning, assures better validity than an assessment of a statement consisting of many long questions with short answers.

### **5.2.1 Criteria Based Content Analysis (CBCA Criteria)**

The following 19 criteria are used in the evaluation of the statement<sup>110</sup>:

#### **General Characteristics**

1. Logical structure
2. Unstructured production
3. Quantity of details

#### **Specific Contents**

4. Contextual embedding
5. Descriptions of interactions
6. Reproduction of conversation
7. Unexpected complications during the incident

#### **Peculiarities of content**

8. Unusual details

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<sup>110</sup> Steller, Max. *Assessing Credibility of Children's Statements About Sexual Abuse*. Institute of Forensic Sciences, Istanbul University on June 29, 2000.



9. Superfluous details
10. Accurately reported details misunderstood
11. Related external associations
12. Accounts of subjective mental state
13. Attribution of perpetrator's mental state

### **Motivation Related Contents**

14. Spontaneous details
15. Admitting lack of memory
16. Raising doubts about one's own testimony
17. Self-deprecation
18. Pardoning the perpetrator

### **Offence Specific Elements**

19. Details characteristic of the offence

## **5.2.2 Criteria Based Content Analysis (CBCA) overview**

It is not necessary to find all of the 19 cited criteria present in every statement. The number of criteria found in a given statement permits the analyzer to make a qualitative evaluation of its validity. If the statement meets a combination of given criteria that proves to be of a high quality, it supports the assumption that the statement is based on reality. There is no numerical scoring or cut-offs established for this method. The evaluation of the nineteen criteria is the “heart” of the analysis, with consideration given to the birth of the statement, how it was developed, personality traits of the person giving the statement, and their motivation for giving the statement. The method cannot determine if something really happened or not. It can only evaluate the quality of the declaration.

### 5.3 Scientific Content Analysis (SCAN)

In the late 1980's Avinoam Sapir immigrated to the United States and began teaching a method of statement analysis he created, "Scientific Content Analysis" (SCAN)<sup>111</sup>. Sapir, with a background in code breaking for the Israeli Intelligence, and a polygraph examiner in the Israeli Police Department in Jerusalem, holds a Bachelors Degree in both Psychology and Criminology, and a Masters Degree in Criminology. He developed the SCAN technique by conducting extensive research into verbal communication, looking into the linguistic behavior used by people in communication.

#### 5.3.1 Scientific Content Analysis (SCAN) concepts

Sapir believed that an open statement, written by a suspect, could be assessed for truth or deception. He postulated the following:

Everyone wants to give all information to everyone.

It is easier to talk to a stranger than someone you know.

The only forbidden question is the one the suspect says, "I don't want to answer." (Resistance by content)

If the suspect answers my question with a question he is resisting by structure, which indicates it is a sensitive area of inquiry. Therefore, there is a conflict if the suspect does not end the sentence with a period.

The suspect learns from the interviewer's questions, therefore the interviewer must be careful of what he introduces into the interview.

As long as the suspect is not saying, "I don't want to talk," then he

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<sup>111</sup> Lesce, Tony. *SCAN: Deception Detection by Scientific Content Analysis*. Law and Order Magazine, Vol. 38 No. 8, August 1990

wants to talk.

### **5.3.2 Scientific Content Analysis (SCAN) component in the Forensic Assessment Interview Technique (FAINT)**

The first step in SCAN is to obtain an open or “pure” statement. The purpose of obtaining a pure version of events in the form of an open statement from the suspect is to enable the assessor to break the suspect's linguistic code. In the FAINT interview, question #7, “Write in detail what you know about this and how you would explain it?” serves this purpose.

Once an open statement is obtained the assessor will evaluate the flow of the statement. Every statement has three parts: the pre-incident (what led up to the incident), the incident itself, and the post incident (what happened after the incident took place).

The ideal flow of a truthful statement is: pre-incident 20 percent, incident 50 percent, and post incident 30 percent. Simply put, a truthful statement is where the post incident is greater than the pre-incident, and the incident is usually the greatest portion of all.

The reason for the “flow” of the statement to occur in this manner is that the deceptive suspect does not want to have to talk about the incident. Therefore they have a tendency to devote a lot of time in the pre-incident as they attempt to avoid getting to the part of the statement dealing with the incident where they must lie, thus resulting in a long pre-incident. Once they arrive at the part of the statement where they must lie, they tend to lie by omission, thereby resulting in a short narrative about the incident, itself. The post incident deals with what happened after the incident. In statements of false allegations, such as rape and molestation, this part of the statement is where a truthful person tells about the investigative process and their embarrassment about what was done to them. The deceptive suspect does have these experiences, which results in a very small post-incident portion of the statement.

### **5.3.3 Color Coding Scientific Content Analysis (SCAN)**

Sapir teaches a system for color coding the statement to assist in analyzing it. By color coding the statement the assessor is forced to look for all of the nuances Sapir deems important for proper analyzation. The following are the steps required for color coding and analyzing a statement with SCAN:

## **1. Pronouns**

Circle all pronouns: I, you, he, she, we (partner), you, they, my, your, his, her, our (possession), their, us, me. Put an "X" and circle it wherever there is a pronoun missing.

Pronouns equal over 80 percent of confessions in statements.

No one can be confused about pronouns.

Changes in pronouns (I....we...) is a sign of deception.

Lack of pronouns, such as "I" may indicate deception, since it signifies a lack of commitment to the statement. The less "I's," the less reliable the statement is (i.e.: there are seven "I's" in lines 1 - 10; and only four "I's" in lines 11 - 29, the crime probably took place in the second part of the statement where there is less commitment).

Too many pronouns, indicates the suspect is being very careful about what they write; and eventually there will be deception in the statement.

If the pronoun comes before the introduction of a person it may indicate they have a bad relationship (i.e.: "I had breakfast with her, my wife Kathy").

The way suspects write in an attempt not to use “I” may include “we,” “he,” “It was done,” and “Woke up, showered (omit it)”.

"We" indicates a partnership, compliance and a good relationship.

Underline any changes in tense. Telling a story in past tense shows commitment to what is being said. A person can make the truthful statement, “I am not being dishonest.” That is very different from the statement, “I have never been dishonest.” If the suspect does not demonstrate commitment to their statement, why should the interviewer believe it?

## **2. Blue highlight**

Highlight in blue any place where the suspect tells you "why" they did something, or why something happened (key words of this are: because, since, so). Also highlight in blue any mention of leaving a place or departing.

The color blue indicates areas of sensitivity since the writer feels the need to explain their actions, and also may serve as an attempt to slow the statement down, possibly delaying getting to the area of concern in the statement.

## **3. Green highlight**

Highlight in green any person mentioned in the statement, which allows you to identify changes of language.

A change in language must equal a change in reality, or it is a sign of deception. For example, in a deceptive statement, where a baby was murdered by his father, the father identifies the victim as “the baby” in

the pre-incident, “he,” and “it,” during the incident, and only identifies the baby by name in the post incident.

Most changes in language are due to emotions.

With caution we can say the order in which people enter the story reflects their importance in the suspect's life.

Failure to properly "socially introduce" us to a person in the statement indicates problems with the relationship between the writer and that person.

#### **4. Pink highlight**

Highlight in pink any place there is missing time or missing information. Key words of this are: after that, later on, I don't remember. (i.e.: I went to the kitchen to get water. After leaving the kitchen...) (i.e.: RAPIST: "I started to make love": if you started, it is an indication you didn't finish, it also represents resistance) which the suspect uses to replace the missing information.

Sapir believes most suspects lie by OMISSION - leaving out information. Any out of sequence information is also highlighted in pink. This identifies the strategy of the deceptive person by indicating where something has been taken out.

#### **5. Purple highlight**

All objective times are highlighted in purple.

Truthful statement is one where the subjective time = objective time.

Three lines per hour is a good pace. Four to seven lines an hour would be considered inconclusive. Eight, or more lines an hour is a deliberate attempt to slow down the statement, and 85 percent of the time this suspect will lie later in their statement.

3lines:1 hour	9 lines:1 hour	1 line or less:1hour
Norm	Slow down	Crime took place

The average statement is one to one and a half pages; 25 to 37 lines.

## **6. Yellow highlight**

All unimportant information (i.e.: "I got up, brushed my teeth, showered, got dressed, etc,") is highlighted in yellow. Only 10% of suspects make these statements, and are usually found to be withholding information.

Any sentence in the negative is also highlighted in yellow. Key words are: "didn't," "wasn't." The interviewer instructs the suspect to tell what happened, not what didn't happen.

A cluster of yellow and blue together, indicates areas in the statement that are extremely sensitive to the suspect.

## **7. Orange highlight**

Highlight in orange any unnecessary links, such as "said," "told." This does not include "ask." The difference between a truthful and deceptive statement is that the truthful suspect builds the story out of memory. Memory is loaded with a lot of unnecessary information. Truthful stories will have connections to incidents beyond the incident under investigation. The deceptive suspect builds the story out of imagination (in a vacuum). This concept is similar to that of "peripheral details" in Criteria Based Content Analysis (CBCA).

The first sentence in an open statement is very important since this is where the suspect decided to begin the story.

It is interesting to note that many deceptive statements begin with the word "left." Perhaps this indicates they are alone with the victim, giving them opportunity to perform the act.

Take each component of the first sentence and compare it to identical components in the statement mentioned later (i.e.: "Mom" vs. "My mom" indicates the suspect was probably upset with their mother when they did not use the pronoun "my").

The presence of a question in an open statement may indicate the person intentionally took sensitive information out of the statement.

Keep in mind the story is not a chronological report, but what the suspect decided is important. This is also one of the criteria in Criterion Based Statement Analysis (CBSA).

Sapir teaches that the statement creates a new reality, and the investigator must forget about the case facts and focus solely on the statement: the suspect is dead, the statement is alive.

What appears not important to the interviewer, is doubly important to the writer.

There are no coincidences in life.

If a person doesn't say it, it didn't happen.

If a suspect doesn't answer the question, they answer the question! A recent example of this was an interview of Bill Clinton when he was running for the Presidency of the United States, where a reporter



asked, "Mr. Clinton, are any of the rumors concerning you having extra marital affairs true?" To which Clinton responded, "I am not here to talk about my personal life."

The shortest way to give a sentence is the best way, and any deviation is meaningful.

"I don't remember" in an open statement means the suspect does remember, since it is impossible not to remember you do not remember something unless you are asked a specific question about it.

"Not really," means "Really".

"That's about it," does not equal "That's it".

The answer should always be significantly longer than the question.

Non-commitment (lack of pronouns or failure to use past tense) indicates it probably didn't happen.

If a suspect mentions "talking" in a conversation in their statement it was an important conversation.

In homicide cases, if the suspect mentions "talking" in their statement, it is an indication they probably did the crime.

The mention of "doors" in an open statement generally indicates "child abuse" in the past.

The mention of "lights" in an open statement is symbolic of sex. Turning the lights on is an indication of sex, and turning the lights off indicates sexual problems.

If a suspect gives too exact information (another criteria in CBSA), for example describes sitting, standing, routes taken, or sleeping, there is a 70 percent chance there is conflict in the statement.

Doubles ("I came back home. When I came back home I .....") indicates mental conflict on the part of the suspect.

If a suspect talks about "kids," they are identifying age, if they talk about "girls" they are identifying gender, and if there is reference to a "woman" it indicates a sexual attraction.

The word "with" indicates possible conflict. (i.e.: "I was talking with...")

"Talk" is informal, "speaking" is formal.

Statistically the word "truth" is missing from deceptive statements.

If a suspect describes the route they took to get somewhere there is a good chance they are concealing information they don't want you to know about.

There should be no "We" in a sexual assault or kidnapping case from the victim when the alleged victim refers to themselves and the perpetrator in their statement.

#### **5.3.4 Application of Scientific Content Analysis (SCAN)**

In a suspected homicide case, a mildly retarded man reported he was feeding his four-week old baby, food, for the first time. As he was doing this he was using a paper towel to keep cleaning the baby's mouth and face. The towel was getting slimy, so he had to keep folding it. Eventually, it was a small wad of paper, which he allegedly accidentally dropped into the infant's mouth, while trying to clean out some spittle. Due to problems with his fine motor

skills he reported he accidentally forced the paper down the baby's throat when he tried to remove it. The baby subsequently died.

When he was asked by this researcher to tell what this incident was about and how he would explain it, he gave the following “open statement”:

*I would say around 2:00 p.m. Jessica left the apartment to go to her sister's. She went to Mary's and both Mary and Jessica walked up. They were going to play bingo that night. They go quite often. Jessica goes 4 or 5 times per week; her mother goes everyday. When Jessica left she left me and the baby and my dog. The baby was asleep in the living room in a playpen. The baby slept all afternoon. When he woke up he began crying. I wanted to feed him, so I mixed up cereal and formula like it said on the box. I think it was Gerber oatmeal. I had to mix 1 or 2 tablespoons with Enfamil in a dish with warm water. I used a plastic measuring spoon to measure it. I was told by friends to feed the baby the formula and cereal. He was waking up every 15 minutes when we were feeding him by bottle, so I decided to start feeding him cereal and formula on this day. I placed the mix inside a plastic baby dish; the one that you put water inside to keep the food warm. I then took cereal into the living room. I picked up the baby and sat in my usual chair. I then got up and sat in a different chair. The arms of the chair are higher and it was hard to feed the baby. The baby was on my lap with my left arm under his head or back of the neck. The cereal was on the right side in the arm of the chair. I began feeding the baby with my right hand. I put almost all of the food into the baby's mouth. There was 4 ounces of formula and 1 or 2 tablespoons of oatmeal in it. I think I spent about 20 minutes feeding the baby. I spilled some of the cereal onto the baby's shirt and over his mouth. That chair certainly messed me up. I never said that the chair messed me up before. I had a paper towel with me. I think that after I took the food into the living room and put it on the arm of the chair. I returned to the dining room to get a paper towel. I put the paper towel on a stand that was next to the chair. I had to keep getting the towel to wipe his face and shirt. He was crying whenever I spilled it on his mouth. The third time I dropped it on him and also the fifth time I dropped it on him. I kept cleaning him off each time I spilled it on him. He was still crying. I always kept him real clean. The towel was filling up with the cereal and it was getting wetter*

*and wetter and got slimly and small. You have to keep moving it around to get a clean spot on the towel. He was crying as I was wiping his mouth. Somehow, while cleaning him off, I dropped the towel into his mouth. I tried to get it out with my finger, but I was pushing it further in. I probably put my finger in 4 or 5 times, but I couldn't get it out. Then I tried other stuff when I got out of the chair. I was standing up; I turned him over. I had my hand on his chest. I then hit him on his back and squeezed on his stomach a little bit. I didn't squeeze hard because he was a little baby. I couldn't get it out, so I ran downstairs with the baby. I opened the door to Jessica's mother's apartment. All of them were standing there: Mrs. Mary Smith (Jessica's mother) and Jessica's father, her brother and his girlfriend, Terry Jones. I think I said that the baby got a piece of paper stuck down his throat. I think I gave the baby to Jessica's mother. The baby ended up on the couch with Billy doing whatever they told him to do. Some lady was telling us to hit the baby with the heel of the hand on the baby's back and also squeeze the baby. About 5 minutes later the ambulance people arrived. I think there were 3 or 4 ambulance people. They must have taken the baby off the couch and layed him on the table. They were ripping open packets of stuff and shining a light down his throat. They finally got it out with tweezers and set it on the dining room table. It was all bloody and messy, so I threw it into the trash can that was by the table. It was under a desk. They later showed it to me at the police station. It had cigarette ashes all over it. I didn't see anyone get it out. I just figured it was cigarette ashes because the trash can is always full of cigarette ashes. No one told me what the black stuff was on the towel, so I just figured it out. I didn't take it out of the trash can. I don't know who did it. When they were leaving I went upstairs to get my coat and came back down. I wasn't even half way down the steps when they were leaving. I could have gone with them if I wanted to, but I wanted to go get Jessica. There was nothing I could do for Jimmy while he was at the hospital except pray. I went back upstairs for more cigarettes for Jessica and myself. She would probably need cigarettes at the hospital. I then left and walked to the bingo hall. I asked for Jessica, but she wasn't there. I then went to Jessica's sister and asked Mary's boyfriend where Jessica was. He told me that she was at the bingo hall. I went back to the bingo hall and Jessica was there. I motioned for her to come to me. I told her that the baby was in the hospital. I'm not sure what she did. I don't*

*remember whether she went back to tell Mary or whether she got her coat. It took about 20 minutes to walk from the bingo hall to the Williamsport Hospital.*

Here is the same statement analyzed using SCAN's color coding system:

*I would say around 2:00 p.m. Jessica(\*NSI) (Analysis: the suspect gives no social introduction for Jessica, his wife, which indicates a poor relationship between them) left (Analysis: "left" in the first sentence of a homicide suspect is a sign the suspect is the perpetrator) the "X" (Analysis: missing pronoun "my" indicates a lack of commitment to the statement) apartment to go to her sister's(\*NSI) (Analysis: the suspect gives no social introduction for the sister, which indicates a poor relationship between them). She went to Mary's and both Mary and Jessica walked up. They were going to play bingo that night. They go quite often. Jessica goes 4 or 5 times per week; her mother(\*NSI) goes everyday (Analysis: "yellow" represents unimportant information, which indicates it is very important to the suspect in either meaning, or a strategic attempt to slow the statement down attempting to avert getting to the part of the statement where deception will be required). When Jessica left (Analysis: "left" in the first sentence of a homicide suspect is a sign the suspect is the perpetrator) she left me and the(X) (Analysis: missing pronoun "my" indicates a lack of commitment to the statement) baby(\*NSI) (Analysis: The suspect gives no social introduction for "the baby", which indicates a poor relationship between them) and my dog. (Analysis: The suspect uses the possessive pronoun "my" referring to the dog, but does not use it when referring to the baby, which is his son. This indicates he takes possession of the dog, but his son) The(X) baby was asleep in the living room in a playpen. The(X) baby slept all afternoon. When he "chL" (Analysis: The suspect changes his language by referring to "the baby" as "he". Changes in language without an actual change in reality are indicative of deception.) woke up he began crying. I wanted to feed him, so I mixed up cereal and formula like it said on the box (Analysis: anytime a suspect feels the need to explain why he is doing something indicates that this is a sensitive area for the suspect). I think (Analysis: "think" is a "hedge" word which indicates a lack of commitment to the statement) it was Gerber oatmeal. I had to mix 1 or 2 tablespoons with Enfamil in a dish with warm water. I used a plastic measuring spoon to measure I everyday it (Analysis: "yellow"*

represents unimportant information, which indicates it is very important to the suspect in either meaning, or a strategic attempt to slow the statement down attempting to avert getting to the part of the statement where deception will be required). *I was told by friends(\*NSI) to feed the(X) baby (chL)* (Analysis: the suspect changes his language back to “the baby”. Changes in language without an actual change in reality are indicative of deception.) *the formula and cereal. He (chL)* (Analysis: The suspect changes his language by referring to “the baby” as “he”. Changes in language without an actual change in reality are indicative of deception.) *was waking up every 15 minutes when we were feeding him by bottle, so I decided to start feeding him (chL)* (Analysis: the suspect changes his language back to “him”. Changes in language without an actual change in reality are indicative of deception.) *cereal and formula on this day. I placed the mix (chL)* (Analysis: the suspect changes his language by referring to the “formula and cereal” as “mix”. Changes in language without an actual change in reality are indicative of deception.) *inside a plastic baby dish; the one that you put water inside to keep the food warm box* (Analysis: anytime a suspect feels the need to explain why he is doing something indicates that this is a sensitive area for the suspect). *I then* (Analysis: missing time) *took cereal (chL)* (Analysis: the suspect changes his language by referring to the “mix” as “cereal”. Changes in language without an actual change in reality are indicative of deception.) *into the living room. I picked up the(X) baby (chL)* (Analysis: the suspect changes his language back to “the baby”. Changes in language without an actual change in reality are indicative of deception.) *and sat* (Analysis: the suspect gives us a “seated position”. This information is too specific and indicates a deceptive suspect’s attempt to remove information) *in my usual chair. I then got up and sat in a different chair. The arms of the chair are higher and it was hard to feed the(X) baby (ChL) . The baby(X) was on my lap with my left arm under his (chL) head or back of the(X) neck. The cereal was on the right side in the arm of the chair. I began feeding the(X) baby (chL) with my right hand. I put almost all of the food(chL) into the(X) baby’s mouth. There was 4 ounces of formula and 1 or 2 tablespoons of oatmeal in it. I think I spent about 20 minutes feeding the(X) baby it* (Analysis: “yellow” represents unimportant information, which indicates it is very important to the suspect in either meaning, or a strategic attempt to slow the statement down attempting to avert getting to the part of the statement where deception will be required). *I spilled some of the cereal(chL)*

(Analysis: the suspect changes his language by referring to the “mix” as “cereal”. Changes in language without an actual change in reality are indicative of deception.) onto the(X) baby’s shirt and over his mouth. That chair certainly messed me up. I never said that the chair messed me up before. I had a paper towel with me. I think that after I took the food into the living room and put it on the arm of the chair. I returned to the dining room to get a paper towel. I put the paper towel on a stand that was next to the chair (Analysis: Out of sequence information also indicates an area in the statement where information may have been taken out). I had to keep getting the towel (chL) (Analysis: the suspect changes his language by referring to the “paper towel” as “towel”. Changes in language without an actual change in reality are indicative of deception.) to wipe his (chL ) (Analysis: the suspect changes his language by referring to the “baby” with “pronouns”. Changes in language without an actual change in reality are indicative of deception. Interestingly, the suspect will not use “the baby” again until after the incident is over) face and shirt. He was crying whenever I spilled it on his mouth. The third time I dropped it on him and also the fifth time I dropped it on him. I (beginning of Incident) I kept cleaning him off each time I spilled it on him. He was still crying. I always kept him real clean. box (Analysis: anytime a suspect feels the need to explain why he is doing something indicates that this is a sensitive area for the suspect) The towel was filling up with the cereal and it was getting wetter and wetter and got slimly and small. You have to keep moving it around to get a clean spot on the towel box (Analysis: anytime a suspect feels the need to explain why he is doing something indicates that this is a sensitive area for the suspect). He was crying as I was wiping his mouth. Somehow (Analysis: missing information), while cleaning him off, I dropped the towel into his mouth. I tried to get it out with my finger, but (“but” cancels what comes before it, leaving the sentence to read: “I was pushing it further in”) I was pushing it (chL) (Analysis: the suspect changes his language by referring to the “towel” as “it”. Changes in language without an actual change in reality are indicative of deception.) further in. I probably (Analysis: hedge word lacks commitment) put my finger in 4 or 5 times, but but (“but” cancels what comes before it) I couldn’t get it out. I (end of Incident) Then I tried other stuff when (Analysis: missing information) I got out of

the chair. **I was standing up; I turned him over. I had my hand on his chest. I then hit him on his back and squeezed on his stomach a little bit. I didn't squeeze hard because he was a little baby. I couldn't get it out,** so (Analysis: sensitive information since suspect feels need to explain his actions) **I ran downstairs with the(X) baby (chL)** (Analysis: a change of language is indicative of deception unless there is a change in reality - first time he said "the baby" since Incident began). **I opened the door** (Analysis: sign of possible abuse) **to Jessica's mother's apartment. All of them were standing there: Mrs. Mary Smith (Jessica's mother) and Jessica's father, her brother and his girlfriend, Terry Jones** (Analysis: suspect properly introduces the females but not the males which may be indicative of problems with male relationships). **I think** (Analysis: hedge word lacks commitment) **I said that the(X) baby got a piece of paper (chL)** (Analysis: a change of language is indicative of deception unless there is a change in reality) **stuck down his throat (chL)** (Analysis: a change of language is indicative of deception unless there is a change in reality). **I think** (Analysis: hedge word lacks commitment) **I gave the(X) baby to Jessica's mother. The(X) baby ended up** (Analysis: missing time) **on the couch with Billy doing whatever they told him to do. Some lady(NSI) was telling (chL)** (Analysis: a change of language is indicative of deception unless there is a change in reality) **us to hit the(X) baby with the heel of the hand on the(X) baby's back and also squeeze the(X) baby. About 5 minutes later** (Analysis: missing time) **the ambulance people arrived. I think** (Analysis: hedge word lacks commitment) **there were 3 or 4 ambulance people. They must have** (Analysis: improper tense can indicate a lack of commitment to the statement) **taken the(X) baby off the couch and layed him on the table. They were ripping open packets of stuff and shining a light down his throat. They finally got it (chL)** (Analysis: a change of language is indicative of deception unless there is a change in reality) **out with tweezers and set it on the dining room table. It was all bloody and messy, so I threw it into the trash can that was by the table** (Analysis: anytime a suspect feels the need to explain why he is doing something indicates that this is a sensitive area for the suspect). **It was under a desk. They later showed it to me at the police station. It had cigarette ashes all over it. I didn't see anyone get it out. I just figured it was cigarette ashes because the trash can is always full of cigarette ashes. No one told me what the black stuff was on the towel (chL)** (Analysis: a change of language is indicative of deception unless there is a change in



reality), *so I just figured it out. I didn't take it out of the trash can. I don't know who did it* (Analysis: Out of sequence information also indicates an area in the statement where information may have been taken out). *When they were I went upstairs to get my coat and came back down. I wasn't even half way down the steps when they were leaving* (Analysis: "when they were leaving" "when they were leaving" is a double, which indicates mental conflict). *I could have gone with them if I wanted to, but ("but" cancels what comes before it) I wanted to go get Jessica. There was nothing I could do for Jimmy (chL)* (Analysis: a change of language is indicative of deception unless there is a change in reality – interestingly, this is the first time the suspect used the child's name) *while he was at the hospital except pray. I went back upstairs for more cigarettes for Jessica and myself* (Analysis: "yellow" represents unimportant information, which indicates it is very important to the suspect in either meaning, or a strategic attempt to slow the statement down attempting to avert getting to the part of the statement where deception will be required). *She would probably need cigarettes at the hospital. I then left and walked to the bingo hall. I asked for Jessica, but she wasn't there. I then went to Jessica's sister and asked Mary's boyfriend where Jessica was. He told me that she was at the bingo hall. I went back to the bingo hall and Jessica was there. I motioned for her to come to me. I told (chL)* (Analysis: a change of language is indicative of deception unless there is a change in reality) *her that the(X) baby (chL)* (Analysis: a change of language is indicative of deception unless there is a change in reality) *was in the hospital. I'm not sure what she did. I don't remember whether she went back to tell Mary or whether she got her coat. It took about 20 minutes to walk from the bingo hall to the Williamsport Hospital.*

In analyzing this actual statement it is immediately noticeable the suspect began by saying, "I would say around 2 p.m. Jessica left the apartment to go to her sister's house. She went to Mary's and both Mary and Jessica walked up. They were going to play bingo. They go quite often. Jessica goes 4 to 5 times a week, her mother goes everyday. When Jessica left she left me with my dog and the baby."

Sapir reports a high correlation between a suspect using the word "left" in the first sentence of a homicide case, and deception. As previously stated, perhaps this is because it usually leaves the suspect alone with the victim, giving him opportunity to commit the crime.

Since the suspect didn't say who Jessica (his wife) was, using what Sapir terms “a proper social introduction”, according to SCAN, it indicates a problematic relationship.

When the suspect began the story with unimportant information about bingo games, it could also be determined there was a high chance the statement was going to be deceptive, and that unimportant information (bingo) was very important to the suspect and the story.

When the suspect used the possessive pronoun "my" in identifying the dog, and failed to use a possessive pronoun when talking about his son (“the baby”), the statement became highly problematic.

After analyzing the statement and conducting a FAINTE interview, the suspect was informed he was not being truthful. He subsequently confessed that his baby was causing relationship problems between him and his wife; they (baby and wife) never bonded. She was always going to bingo now leaving him home alone to care for the baby, and therefore he decided to kill him.

#### **5.4 Conclusion and summary**

The principles of statement analysis are useful to the FAINTE interviewer to consider when assessing a written statement, as well as when analyzing many of the psychological factors involved in the spoken word. This synergetic component transforms the FAINTE interview into a dynamic process for evaluating truth or deception.

It is the validity of this entire process that this experimental research sets out to test.

## CHAPTER 6

### The Application of the Forensic Assessment Interview Technique (FAINT) in Practice

#### 6.1 The experimental method

To determine if the FAINT process would allow four professionals doing independent blind evaluations to accurately measure differences between truth and deception, fifty-one actual interviews of criminals in both multiple suspect (i.e.: employee theft) and single suspect cases (i.e.: rape), where ground zero truth<sup>112</sup> had been established were accumulated. The above interviews accurately recorded the original forensic interviewer's nonverbal and verbal observations, as well as the suspect's written responses to the questions on the structured FAINT form (Appendum A). The four evaluators were required to read, assess, score and make conclusions regarding the truth or deception of each of the 51 suspects. All four evaluators had been previously trained in the FAINT process at the Academy for Scientific Investigative Training, and therefore were familiar with the FAINT format and questions.

#### 6.2 Procedure

The four evaluators were to analyze and score fifty-one subjects. Thirty nine (39) of the suspects were male, and twelve (12) were female. The responses of the fifty-one suspects were recorded during interviews resulting from twenty-two investigations, which involved

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<sup>112</sup> Ground zero truth for interviewees determined to be deceptive were confirmed by confession, and for those determined to be truthful by the confessions of deceptive interviewees in the same cases.

six different categories of crimes. The suspect and categories of crime appear in Table 1. The scoring process to be used was as follows:

- If there was no specific nonverbal behavior each question was assessed based on the verbal answer alone and given a score of +1 if perceived truthful, and a -1 if perceived deceptive.
- The same score was given if the nonverbal behavior was in agreement with the verbal behavior.
- If there was a disagreement between nonverbal and verbal behavior the question was given a score of 0.

**Table 5 Breakdown of suspects and categories of crimes used in the study**

SUSPECTS (51)	CRIMES (22)
36	Theft (10)
4	Sexual Assault/ Rape (6)
5	Molestation (3)
4	Arson (1)
1	Aggravated Assault (1)
1	Robbery (1)

**6.3 Results of the Forensic Assessment Interview Technique (FAINT) using the 3 point scoring scale**

The four evaluators correctly solved 86 percent of the twenty-two cases they reviewed, excluding “Inconclusives” (which are defined as suspects where they were unable to classify as truthful or deceptive, due to “insufficient” data), and 83.5 percent where “Inconclusives” were included and viewed as errors.

**Table 6 Cases solved by evaluators using FAINT 3 point scoring system**

Cases solved excluding Inconclusives: 86%	Evaluator:	1	2	3	4
		88%	82%	82%	92%
Cases solved including Inconclusives: 83.5%	Evaluator:	1	2	3	4

The cohorts involved were 31 truthful and 20 deceptive suspects, requiring 204 assessments to be made (124 truthful assessments and 80 deceptive assessments). Of the 124 assessments of truthful suspects, 3 were assessed to be inconclusive, and 111 were correctly assessed as truthful. Thus, there was a 92 percent accuracy rate in the assessment of truthful suspects. Of the 80 assessments of deceptive suspects, 2 were assessed to be inconclusive, and 65 were correctly assessed to be deceptive. Thus, there was an 83 percent accuracy rate in the assessment of deceptive suspects. Overall accuracy for the 199 assessments made was 88 percent, with only 5 of the 204 assessments deemed inconclusive - 2.5 percent.

**Table 7 Accuracy of evaluators using FAINT 3 point scoring system**

<b>Ground Zero</b>	<b>Truthful Determinations</b>	<b>Deceptive Determinations</b>	<b>Inconclusives</b>
124 TRUTHFUL	111 (92% Accuracy)	10 (8% F/P)	3
80 DECEPTIVE	13 (17% F/N)	65 (83% Accuracy)	2

### 6.3.1 Errors

Utilizing the traditional FAINT 3 Point Scoring Scale the evaluators had an 8 percent false positive rate and a 17 percent false negative rate. Qualitatively, the errors made were more likely to be false negatives, deceptive suspects assessed to be truthful. This is the same result as in the earlier cited Behavioral Analysis Interview study, and is exactly opposite of most polygraph errors which are more likely to be false positives, truthful suspects assessed to be deceptive. Given that the error rates between these two processes (FAINT and Polygraph) are in opposite directions, it may further support the use of the FAINT interview assessment as the pre-test interview tool for polygraph examinations to give a more accurate overall assessment of a suspect's truthfulness. That however, is outside the scope of this investigation, and therefore is introduced as a matter of speculation and a direction for future research.

Table 8 shows the actual scores and assessments of the four evaluators of each suspect, as well as each evaluator's accuracy.

**Table 8 Scores and assessments made by evaluators using FAINT 3 point scale**

Case	Type	Ground Zero	Evaluator1**	Evaluator2**	Evaluator3**	Evaluator4**
1-1	Theft	D	D/-7	T/2*	D/-6	D/-7
1-2		T	T/11	?/0	T/8	T/12
1-3		T	T/14	T/5	T/4	T/3
2-1	Theft	T	T/19	T/10	T/16	T/7
2-2		T	T/16	T/2	T/14	D/-6
2-3		T	T/16	T/5	?/5	T/-2
2-4		D	T/11	D/-6	T/11	T/-4
2-5		T	D/-2	T/9	?/5	T/5
2-6		T	T/15	T/13	T/13	T/7
2-7		T	T/15	T/17	T/11	T/6
3-1	Theft	T	T/18	T/-8	T/5	T/-2
3-2		T	T/7	T/-4	T/5	T/8
3-3		T	T/7	T/8	T/4	T/-2
3-4		T	T/21	T/22	T/10	T/10
3-5		D	T/9	T/5	T/4	D/-8
3-6		T	T/15	T/10	T/18	T/12
3-7		T	D/-4	T/-2	T/-3	T/-6
3-8		T	T/12	T/1	T/6	T/15
3-9		T	T/32	T/19	T/17	T/20
3-10		T	T/2	D/-10	T/2	T/1
3-11		T	T/18	T/-4	D/-5	T/5
3-12		T	T/19	T/17	T/9	T/13
3-13		T	T/21	T/6	T/14	T/13

4-1	Rape	D	D/-12	D/-11	D/-8	D/-5
5-1	Agg. Assault	D	D/-5	D/-5	D/-5	D/-7
6-1	Molestation	D	D/-9	D/-8	D/-8	D/-11
7-1	Molestation	D	D/-9	D/-10	D/-16	D/-11
8-1	Theft	D	D/-1	T/9	D/-1	D/-9
8-2		T	T/9	D/0	T/2	T/7
9-1	Theft	D	T/8	T/11	T/7	T/3
9-2		T	D/5	D/0	D/-5	D/-4
10-1	Theft	D	D/-3	D/-3	D/-4	D/-4
11-1	Theft	D	D/-1	T/11	D/3	D/1
11-2		T	T/12	T/16	T/13	T/13
11-3		T	T/16	T/4	T/15	T/4
12-1	Theft	T	T/13	T/1	T/-4	T/-3
12-2		D	D/-20	D/-18	D/-18	D/-20
12-3		T	T/13	T/19	T/22	T/14
13-1	Robbery	D	D/-6	D/-16	D/-14	D/-18
14-1	Sexual Assault	D	D/-5	D/-8	D/-3	D/-8
15-1	Rape	D	D/-4	D/-5	?/2	D/1
16-1	Theft	T	T/13	T/13	T/14	T/3
17-1	Sexual Touching	D	D/-6	D/-4	?/1	D/-6
18-1	Rape	D	D/-6	D/-8	D/-4	D/-5
19-1	Theft	D	D/-9	D/-8	D/-12	D/-5
20-1	Sexual Assault	D	D/-1	D/-7	D/-6	D/-6
21-1	Rape	T	T/7	T/13	T/9	T/10
22-1	Arson	T	T/18	T/15	T/19	T/22
22-2		T	T/9	T/-2	T/10	T/3

22-3		T	T/3	T/-1	T/10	T/18
22-4		D	D/-11	D/-8	D/-2	D/0

\* Figures appearing in red indicate errors in assessments.

\*\*204 Assessments: Evaluator #1: 88% Accuracy (45 Correct/6 Errors)  
 Evaluator #2: 88% Accuracy (44 Correct/6 Errors/1 Inconclusive)  
 Evaluator #3: 89% Accuracy (42 Correct/5 Errors/4 Inconclusive)  
 Evaluator #4: 92 % Accuracy (47 Correct/4 Errors)

### 6.3.2 Predictability of numerical assessments utilizing FAIN 3 point scoring scale

By analyzing all of these individual assessment scores it is now possible to predict that an assessment score of a 0 or higher, would result in 88 percent accuracy for determinations of truthfulness, and an assessment score of a -5, or lower, would result in 89 percent accuracy for determinations of deception. Table 9 shows the distribution of the evaluator’s numerical scores in the 51 cases they assessed. Suspects who were later verified as truthful are color coded in green, and those later verified as deceptive are color coded in red.

**Table 9 Evaluator’s distribution of scores and predictability of determinations**

<i>Predictability of a Truthful Determination:</i>	<i>Evaluator’s Scores</i>	<i>32</i>	<i>T</i>	<i>Predictability of a Deceptive Determination</i>	<i>0</i>
100	22	TTT	0		
100	21	TT	0		
100	20	T	0		
100	19	TTTTT	0		
100	18	TTTTT	0		
100	17	TTT	0		
100	16	TTTTT	0		
100	15	TTTTTT	0		
100	14	TTTTT	0		
100	13	TTTTTTTTTTTT	0		
100	12	TTTT	0		
93	11	TTDDDD	7		
94	10	TTTTTTT	6		
92	9	TTTTTDD	8		
91	8	TTTD	9		
90	7	TTTTTTD	10		
90	6	TTT	10		
90	5	TTTTTTTTTD	10		
90	4	TTTTD	10		



89	3	TTTTDD	11
88	2	TTTTDD	12
88	1	TTDDDD	12
88	0	TTTD	12
85	-1	DDDDT	15
25	-2	DTTTTTT	75
19	-3	DDDTT	81
17	-4	DDDDDDTTTT	83
11	-5	DDDDDDDDTT	89
9	-6	DDDDDDDDTT	91
6	-7	DDDD	94
7	-8	DDDDDDDDDT	93
5	-9	DDDD	95
6	-10	DT	94
0	-11	DDDD	100
0	-12	DD	100
0	-14	D	100
0	-16	DD	100
0	-18	DDD	100
0	-20	DD	100

### 6.3.3 Analysis of single issue cases

Of these twenty-two (22) above described cases there were ten involving employee thefts ranging from a single suspect, to one case of employee theft with thirteen suspects. Multi-suspect employee theft cases present variables not present in other types of criminal investigations. In multi-suspect employee thefts there may be many employees who have committed previous thefts from their employer, but, are innocent of the instant crime being investigated. These prior thefts often result in attitudinal changes that cause innocent employees to emit nonverbal, verbal and written behavior generally associated with deception. This latter situation, while interesting, also remains an area for future research.

When these multi-suspect employee thefts are eliminated from the study there remain fifteen (15) cases involving eighteen (18) suspects. Among these were six(6) Sexual Assault/Rape cases, one (1) Aggravated Assault case, three (3) Sexual Molestation cases, three (3) Theft cases, one (1) Robbery case, and one (1) Arson case which had four suspects. Among this cohort, thirteen (13) of the suspects were guilty of the crimes being investigated and five (5) were innocent.

Accuracy of the four evaluators for this subset of FAINT assessments was 100 percent when “Inconclusives” were eliminated and 96 percent when they were included and counted as errors. There were no false positives or false negatives. Although the truthful suspect group may be too small for statistical conclusions to be drawn, it is important to note that all five were assessed truthful by all evaluators. As to the larger, more statistically significant, deceptive group, three evaluators assessed all thirteen to be deceptive, and one evaluator assessed eleven to be deceptive and two to be inconclusive.

**Table 10 Single suspect case accuracy with “Inconclusives” considered as errors**

Ground Zero	Truthful Assessments	Deceptive Assessments	Inconclusives
20 TRUTHFUL	20 (100% Accuracy)	0 (0% F/P)	0
52 DECEPTIVE	50 (96% Accuracy)	0 (0% F/N)	2 (3%)

An analysis of these individual assessments of single issue suspect cases allows us to predict that an assessment score of a +3, or higher, would be 100 percent accurate for determinations of truthfulness, and an assessment score of a +2, or lower, would be 96 percent accurate for determinations of deception.

### 6.3.4 Predictability 3 point scoring scale in single issue cases

Table 11 is a distribution of the evaluator’s numerical scores for the 72 assessments made of the 15 single issue suspect cases, demonstrating the validity of the above conclusion.

**Table 11 Evaluator’s distribution of scores for single issue suspect cases**

<i>Prediction of Accuracy</i>	<b>100</b>	<i>Score</i>	22	<i>Evaluator’s Determination</i>	<b>T</b>
	<b>100</b>		19		<b>T</b>
	<b>100</b>		15		<b>T</b>
	<b>100</b>		14		<b>T</b>
	<b>100</b>		13		<b>T T</b>
	<b>100</b>		10		<b>T T T T</b>
	<b>100</b>		9		<b>T T</b>
	<b>100</b>		7		<b>T</b>
<b>Truthful = +3</b>	<b>100</b>		3		<b>T T T</b>
<b>Deceptive = +2</b>	<b>96</b>		2		<b>D</b>
	<b>96</b>		1		<b>D D</b>
	<b>96</b>		0		<b>D</b>

96	-1	T D
98	-2	T D
100	-3	D D D
100	-4	D D D D D
100	-5	D D D D D D D D
100	-6	D D D D D D
100	-7	D D
100	-8	D D D D D D D D
100	-9	D D D
94	-10	D
100	-11	D D D D
100	-12	D D
100	-14	D
100	-16	D D
100	-18	D

#### 6.4 Weighted scoring system

A meta-analysis was performed on the responses of both truthful and deceptive suspects to determine whether certain questions elicited answers that needed to be weighted, given that they might be more consistently predictive of truth or deception.

This proved a fruitful line to pursue. Some questions indeed showed lesser value in predicting truth or deception, while others appeared to have greater value. Based on that, an analysis was performed which confirmed that certain questions did have a higher correlation in predicting outcomes.

For example, when asked, “Who would you suspect?” 20 of the 41 suspects asked the question named someone. All 20 of these suspects were later verified as truthful. On the other hand, of the remaining 21 suspects who did not give a name, 10 were later verified as truthful and 11 as deceptive. Therefore, while naming a suspect resulted in a high correlation to final outcome, not naming a suspect offered no value for predicting the suspect’s involvement in the crime.

Based upon an answer’s predictability a number was assigned derived from standard deviations in a reliability test. If the answer predicted a truthful outcome it received a

positive number and a negative number if it was predictive of a deceptive outcome, as follows:

- 3 Standard Deviations       $\pm 3$
- 2 Standard Deviations       $\pm 2$
- 1 Standard Deviation       $\pm 1$

The criterion used to weight the answers was the reliability of the question's answer in predicting final ground zero truth or deception. Table 12 shows each question asked, the criteria used for analysis, their predictability to the final outcome and the score assigned for the criteria in the weighted scoring system.

**Table 12      Evaluations of responses and their ability to predict final outcome**

QUESTION ASKED:	CRITERIA USED:				Truthful	Predictability	Deceptive	Predictability
How do you like working there?	Positive Answer/No Hesitation-Adaptors-Coding (Great/Love It/Good/Like it)							
	*Truthful +	Truthful -	Deceptive +	Deceptive -	%		%	
	19	7	2	7	21	90 +3	14 0	50
What is this about?	Strong Language (Steal/Theft/Rape)							
	Truthful +	Truthful -	Deceptive +	Deceptive -	%		%	
	8	4	1	16	9	88 +2	20 -2	80
	Medium Language (Missing)							
	Truthful +	Truthful -	Deceptive +	Deceptive -	%		%	
	17		3		20	85 +2		
Why were you selected to be interviewed?	Includes self as Suspect							
	Truthful +	Truthful -	Deceptive +	Deceptive -	%		%	
	18	12	5	12	23	78 +1	24 0	50
How do you feel about being interviewed?	Positive Answer with No Hesitation/No Adaptors (fine/okay/alright)							

	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	16	14	4	15	20	80 +2	29	51 0
Write in detail what this is about	Explains Crime With Strong Language/Pronouns							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	28	3	8	12	36	77 +1	15	80 -2
Did you ever think about doing something like this?	No Hesitation-Adaptors							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	26	5	9	9	35	74 +1	14	64 -1
Did you do it?	No Hesitation/No Adaptors							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	27	4	10	8	37	72 +1	12	66 -1
Who would you suspect?								
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	20	10		11	20	100 +3	21	52 0
Who would you vouch for?								
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	21	9	5	6	26	80. +2	15	40 0
What should happen to the person?	Strong Punishment (fired/prosecution)							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	27	4	5	14	32	84 +2	18	77 -1
Would you give them a second chance?	"No" with No Hesitation							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%

	24	7	4	15	28	85 +2	22	68 -1
What will investigation show concerning you?	Positive Answer							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	20	9	3	15	23	87 +2	24	62 -1
Any reason for evidence against you?	"No" with No Hesitation-Hedges							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	24	7	5	13	29	83 +2	20	65 -1
Willing to chip in so investigation could be dropped?								
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	23	3	2	5	25	92 +3	8	62 -1
Did you tell anyone you would be interviewed?								
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	10	2	12	2	22	45 0	4	50 0
Why do you think someone would do this?	Negative/Condescending/I don't know							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	18	13	5	10	23	78 +1	23	43 0
Do you think it was deliberate or accidental?								
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	16	7	1	7	17	94 +3	14	50 0
If you had 3 questions to ask what would they be?	Strong Q: Did you do it?							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	8	7	3	6	11	72	13	46

						+1		0
Do you know for sure who did it?	"No" with No Hesitation							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	15	2	3	1	18	83 +2	3	33 0
Did you lie about whether you did this?	"No" with No Hesitation							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	20	3	2	6	22	91 +3	9	66 -1
Should I believe you?	Plus: Didn't Lie/Told Truth/Didn't Do It							
	Truthful +	Truthful -	Deceptive +	Deceptive -		%		%
	13	7	1	4	14	93 +3	11	36 0
Willing to return?	EVERYONE ANSWERED "YES"							

\*Answers coded in black represent responses generally considered to be indicative of truthfulness, and those color coded red, indicative of deception. Numbers on the far right, color coded in green represent the question's predictability to ground zero truth, and those color coded in red represent the question's predictability to ground zero deception, along with the appropriate weighting.

#### 6.4.1 Results of weighted question scores

Based on these weighted figures a new panel of four independent evaluators who had also completed the FAINT seminar blindly reassessed the interviews of the 51 suspects using the weighted criteria. These four evaluators correctly solved 90 percent of the twenty-two cases they reviewed; with no "Inconclusive" assessments (see Table 13).

**Table 13 Cases solved by evaluators using FAINT weighted scoring system**

<b>Cases Solved: 90%</b>	<b>Evaluator:</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>
		86%	91%	86%	95%

Using the weighted method, of the 124 truthful assessments, 120 were correctly assessed truthful, resulting in a 97 percent overall accuracy rate of assessments of truthful suspects. Of the 80 deceptive assessments, 72 were correctly assessed to be deceptive, resulting in a 90 percent overall accuracy rate of the deceptive suspects. One deceptive assessment was inconclusive. Thus, overall accuracy for the 204 decisions made was 94 percent, with the 1 inconclusive counted as an incorrect decision. The tables below and discussion describe the nature and extent of the improvement in accuracy.

**Table 14 Accuracy of evaluators using the FAINT weighted scoring system**

Ground Zero	Truthful	Inconclusive	Deceptive
124 TRUTHFUL	120	0	4 (3 % F/P)
80 DECEPTIVE	7(8% F/N)	1	72

**Table 15 Scores and assessments made by evaluators using the FAINT weighted scoring system**

Case	Type	Ground Zero	Evaluator 1	Evaluator 2	Evaluator 3	Evaluator 4
1-1	Theft	D	D/0	D/0	D/3	D/1
1-2		T	T/5	T/24	T/30	T/17
1-3		T	T/12	T/26	T/28	T/19
2-1	Theft	T/13	T/29	T/15	T/22	T/14
2-2		T/11	T/16	D/14	T/17	T/7
2-3		T/14	T/20	T/23	T/20	T/16
2-4		D/2	D/-19	<b>T/18</b>	D/14	D/3
2-5		T/11	T/13	T/15	T/18	T/17
2-6		T/15	T/26	T/25	T/22	T/30
2-7		T/13	T/25	T/23	T/21	T/25
3-1	Theft	T/14	T/18	T/24	T/18	T/14
3-2		T/7	T/6	T/15	T/9	T/11
3-3		T/3	T/9	T/20	T/12	T/12
3-4		T/2	T/15	T/20	T/15	T/9



3-5		D/-6	D/6	D/6	D/-3	D/0
3-6		T/12	T/20	T/25	T/29	T/7
3-7		T/4	T/16	T/18	T/22	T/13
3-8		T/6	T/13	T/17	T/13	T/12
3-9		T/9	T/23	T/24	T/24	T/21
3-10		T/0	T/7	T/12	T/5	T/19
3-11		T/-5	T/9	T/7	T/7	T/1
3-12		T/13	T/20	T/7	T/17	T/10
3-13		T/7	T/27	T/25	T/29	T/19
4-1	Rape	D	D/-5	D/-6	D/-1	D/0
5-1	Agg. Assault	D	D/-6	D/-9	D/-9	D/-9
6-1	Molestation	D	D/-5	D/-4	D/-7	D/-8
7-1	Molestation	D	?/5	D/-3	D/-4	D/-5
8-1	Theft	D	D/8	D/8	D/11	D/9
8-2		T	T/16	T/17	T/14	T/17
9-1	Theft	D	T/15	T/13	T/10	T/12
9-2		T	D/1	D/6	D/3	D/1
10-1	Theft	D	D/-4	D/3	D/0	D/0
11-1	Theft	D	D/7	D/15	D/9	D/1
11-2		T	T/19	T/30	T/22	T/16
11-3		T	T/21	T/18	T/27	T/14
12-1	Theft	T	T/17	T/15	T/10	T/1
12-2		D	D/-5	D/-5	D/-7	D/-4
12-3		T	T/34	T/34	T/35	T/29
13-1	Robbery	D	D/-9	D/-1	D/-10	D/-9
14-1	Sexual Assault	D	D/2	D/-1	D/-4	D/-4
15-1	Rape	D	D/-2	D/1	D/0	D/-1
16-1	Theft	T	T/12	T/17	T/14	T/14
17-1	Sexual Touching	D	D/-4	D/-3	T/7	D/-3
18-1	Rape	D	D/0	D/-9	D/-3	D/-3
19-1	Theft	D	D/-1	D/-3	D/-0	D/-3
20-1	Sexual Assault	D	D/-3	D/-2	D/2	D/-3
21-1	Rape	T	T/12	T/8	T/13	T/8

22-1	Arson	T	T/21	T/25	T/21	T/21
22-2		T	T/14	T/13	T/10	T/10
22-3		T	T/13	T/19	T/12	T/12
22-4		D	D/-1	D/1	D/-1	D/-4

\*Errors are reflected by the bold "red" numbers.

204 Total Assessments: Evaluator #1: 94% Accuracy (48 Correct/2 Errors/1 Inconclusive)

Evaluator #2: 94% Accuracy (48 Correct/3 Errors)

Evaluator #3: 94% Accuracy (48 Correct/3 Errors)

Evaluator #4: 96 % Accuracy (49 Correct/2 Errors)

#### 6.4.2 Predictability of assessments utilizing the Forensic Assessment Interview Technique (FAINT) weighted scoring scale

Table 16 represents the distribution of the evaluator's numerical scores in the 51 cases assessed using weighted scores. By analyzing these individual assessments it is now possible to predict an assessment score of a +7, or higher, would be 91 percent accurate for determinations of truthfulness, and an assessment score of a +4, or lower, would be 91 percent accurate for determinations of deception.

**Table 16 Evaluators distribution of scores using weighted scores**

<i>Prediction of Accuracy</i>	<i>Score</i>	<i>Evaluator's Determination</i>
100	35	T
100	34	TT
100	30	TTT
100	29	TTT
100	28	T
100	27	TT
100	26	TT
100	25	TTTTTTT
100	24	TTTT
100	23	TTT
100	22	TTTT
100	21	TTTTTT
100	20	TTTTTT
100	19	TTTTT
100	18	TTTTT
100	17	TTTTTTTTT
100	16	TTTTT
97	15	TTTTTTDD
98	14	TTTTTTTT
94	13	TTTTTTT
96	12	TTTTTTTTT
95	11	TD
94	10	TTTTD
93	9	TTTTDD
92	8	TTDD

91	7	T T T T T T D D
89	6	T T D D
89	5	T T D
91	4	T
91	3	T D D D
95	2	D D
95	1	T T T D D D D D
100	0	D D D D D D D D D D
100	-1	D D D D D D D D
100	-2	D D
100	-3	D D D D D D D D D D
100	-4	D D D D D D D D D D
100	-5	D D D D D D
100	-6	D D
100	-7	D D
100	-8	D
100	-9	D D D D D D D
100	-10	D
100	-14	D
100	-18	D
100	-19	D

**6.4.3 Predictability of the weighted scoring scale in single issue cases**

Of the fifteen cases involving the eighteen (18) suspects in single suspect crimes accuracy for this subset of FAINT interviews was 99 percent, when the one inconclusive was eliminated and 96 percent when it was included and counted as an error. There were no false positives, and one false negative. As pointed out previously, the truthful suspect group was small; however, all five of these innocent suspects were assessed truthful by all four evaluators. Two of the evaluators assessed all thirteen of the guilty suspects to be deceptive, one evaluator assessed twelve of thirteen to be deceptive and one to be inconclusive, and one evaluator assessed twelve of thirteen to be deceptive and one to be truthful.

**Table 17 Single suspect case accuracy with the FAINT weighted scoring system**

Ground Zero	Truthful Assessments	Deceptive Assessments	Inconclusives
20 TRUTHFUL	20 (100% Accuracy)	0 (0% F/P)	0
52 DECEPTIVE	1 (2% F/N)	50 (96% Accuracy)	1 (2%)

By analyzing all individual assessments it is now possible to predict an assessment score of a +8, or higher, would be 100 percent accurate for determinations of truthfulness, and an assessment score of a +7, or lower, would be 100 percent accurate for determinations of deception. Table 19 is a distribution of the evaluator’s numerical scores for the 72 assessments they made of the 15 single issue suspect cases.

**Table 18 Evaluator’s distribution of scores and predictability using the Forensic Assessment Interview Technique (FAINT) weighted scores**

	<i>Prediction of Accuracy</i>	<i>Score</i>	<i>Evaluator’s Determination</i>
	100	25	T
	100	21	T T T
	100	19	T
	100	17	T
	100	14	T T T
	100	13	T T T
	100	12	T T T T
	100	10	T T
Truthful = +8	100	8	T T
Deceptive = +7	100	7	D
	100	5	D
	100	3	D
	100	2	D D
	100	1	D D
	100	0	D D D D D D
	100	-1	D D D D D D D
	100	-2	D D
	100	-3	D D D D D D D D D
	100	-4	D D D D D D D D-
	100	-5	D D D
	100	-6	D D
	100	-7	D
	100	-8	D
	100	-9	D D D D D D
	100	-10	D

## 6.5 Conclusion and summary

The research clearly showed that the Forensic Assessment Interview Technique was an accurate process for determining truth and deception. The traditional three point scoring system allowed blind evaluators to successfully solve 86 percent of the cases they analyzed when “Inconclusives” were excluded, and 83.5 percent with “Inconclusives” considered errors. Applying a weighted scoring system increased the cases properly solved to 90 percent, and resulted in only one “Inconclusive” determination. Thus this research clearly supports the use of the Forensic Assessment Interview Technique in conjunction with the weighted scoring system as the optimum process for forensic interviewers to utilize when questioning suspects in an attempt to evaluate their culpability in a crime. Chapter 7 will review the overall findings, conclusions and recommendations of this research.

## **CHAPTER 7**

### **Findings, conclusions and recommendations**

#### **7.1 Findings**

The FAINT interview process is currently being used around the world by government and private personnel to assist in determining a suspect's involvement in a criminal investigation, even though there is no validation of the technique. This research set out to fill that void, by determining whether the FAINT interview process, using a 3 point scoring system could accurately allow a forensic interviewer to determine truthful from deceptive suspects, and further, attempt to establish the accuracy of the prediction of truth or deception based upon the numerical assessment given by the interviewer.

The initial panel, using a three point scoring scale, was able to accurately reproduce the results of the original FAINT interviewer. Their blind evaluations resulted in a 92 percent accuracy of truthful suspects, 83 percent accuracy of the deceptive suspects, and an overall accuracy of 88 percent, with only 5 of the 204 cases determined to be inconclusive - 2.5 percent. While this accuracy does not meet the 95 percent accuracy required for scientific acceptance, it greatly exceeds that of chance expectation, and when compared to the more traditional Behavioral Assessment Interview (B.A.I.) designed by John Reid, clearly shows that by using a system of numerical evaluation, inconclusive results are greatly diminished (B.A.I. had a 34 percent Inconclusive rate, as compared to 2.5 for FAINT).

When employee theft investigations were eliminated from the cases being evaluated, accuracy improved to 100 percent when inconclusive results were not considered and 96 percent when they were counted as errors. The FAINT interview process met the standards of scientific acceptability in either case.

The research indicated that a numerical evaluation of a 0 or higher would be 88 percent accurate in determinations of truthfulness, and a score of -5 or lower would be 89 percent accurate in determinations of deception. These numbers changed when employee theft cases were removed from the group to 100 percent accuracy for decisions of truth where a score of a +3 or higher was rendered, and 96 percent accuracy for determination of deception when a score of a +2 or lower was rendered.

By analyzing the predictability of a suspects answers with the known outcome of the case a weighted scoring system was devised and investigated. The derived weighted criteria utilized by the second panel of blind evaluators resulted in 97 percent accuracy of truthful suspects, and 90 percent accuracy of the deceptive suspects, with only 1 inconclusive. Overall accuracy for the 204 decisions made was 94 percent, with the inconclusive counted as an incorrect decision.

The net effect of using the new “weighted” scoring system was a 5 percent increase in truthful determinations, a 7 percent increase in deceptive determinations, and an overall increase in accuracy of 6 percent, when compared to the original 3 point scoring system previously being used. This relatively small percentage improvement represents a considerable improvement in statistical reliability and must be seen in this latter context.

Based on their weighted evaluations of the suspect’s behavior, predictability scores were established indicating that a total score of +7, or higher, would be 91 percent accurate for determinations of truthfulness, and a score of +4, or lower, would be 91 percent accurate for determinations of deception. In single issue cases, scores could be adjusted, with a +8 or higher resulting in 100 percent accuracy for determinations of truthful, and a +7 or lower, resulting in 100 percent accuracy for determinations of deception.

## **7.2 Conclusions**

This research examined the accuracy of the Forensic Assessment Interview Technique (FAINT) to determine if it was a valid procedure for forensic interviewers to use in their search for truth. Accuracy is determined by the validity and reliability of a procedure. Validity examines whether one is measuring what they purport to be measuring, in this case, truth from deception. Reliability examines whether the results are repeatable. This research clearly shows that the Forensic Assessment Interview Technique (FAINT) is an accurate method in detecting deception.

### **7.2.1 Reliability of the Forensic Assessment Interview Technique (FAINT)**

Two blind studies were performed in this research. One utilized four evaluators to assess 51 suspects using a 3 point numerical scoring system, and the other utilized four different evaluators using a newly developed weighted scoring system.

In the first group, 199 of 204 possible decisions were made. The four evaluators agreed in the assessments they made 188 times, resulting in inter-evaluator reliability exceeding 99 percent.

In the latter group, 203 of 204 possible decisions were made. The four evaluators agreed in the assessments they made 200 times, again, resulting in inter-evaluator reliability exceeding 99 percent.

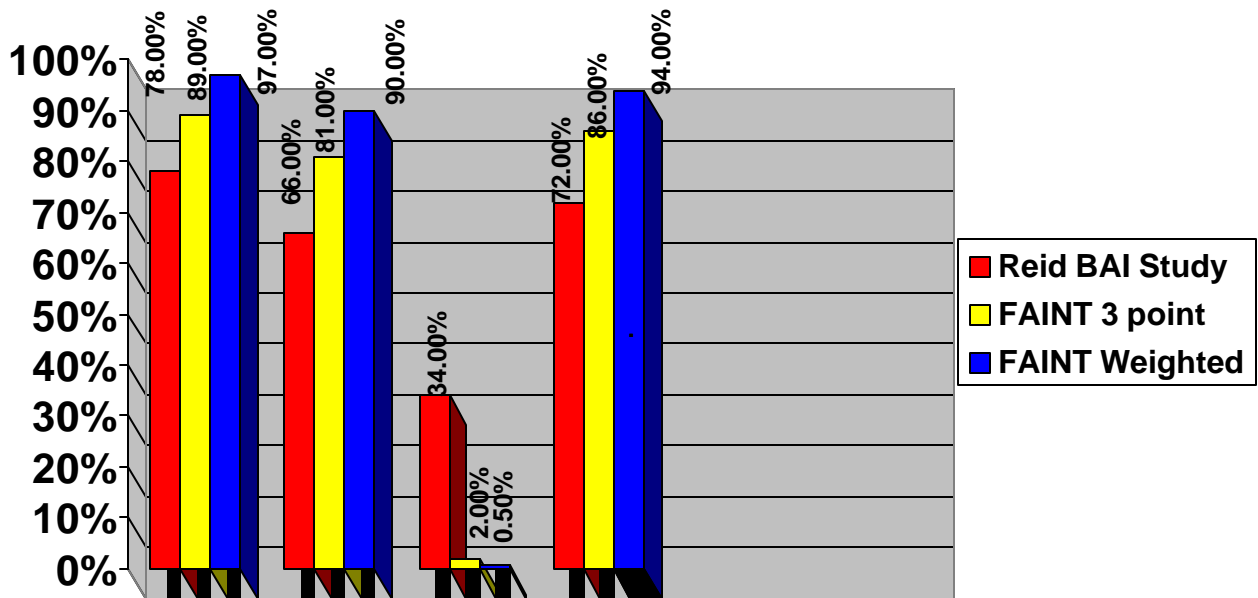
### **7.2.2 Validity of the Forensic Assessment Interview Technique (FAINT)**

Utilizing the 3 point scoring system the evaluators had an overall accuracy of 88 percent, with only 5 of the 204 suspects being deemed “Inconclusive” (2.5 percent). Using the weighted scoring system the evaluators had an overall accuracy of 97 percent, with only 1 of the 204 suspects being deemed “Inconclusive” (.005 percent).

Applying a numerical system for evaluating the interview resulted in a demonstrable decrease in “Inconclusive” decisions that was reported in when using the Behavioral Assessment

Interview (BAI) method. Table 20 and 21 are graphic comparisons of the differences in accuracy using the previously discussed Behavioral Assessment Interview (BAI) method, the Forensic Assessment Interview Technique (FAINT) 3 point scoring method, and weighted method. While these methods clearly demonstrate differences in percentage accuracy, it is important to understand that these differences in assessment accuracy represent far greater differences in statistical reliability.

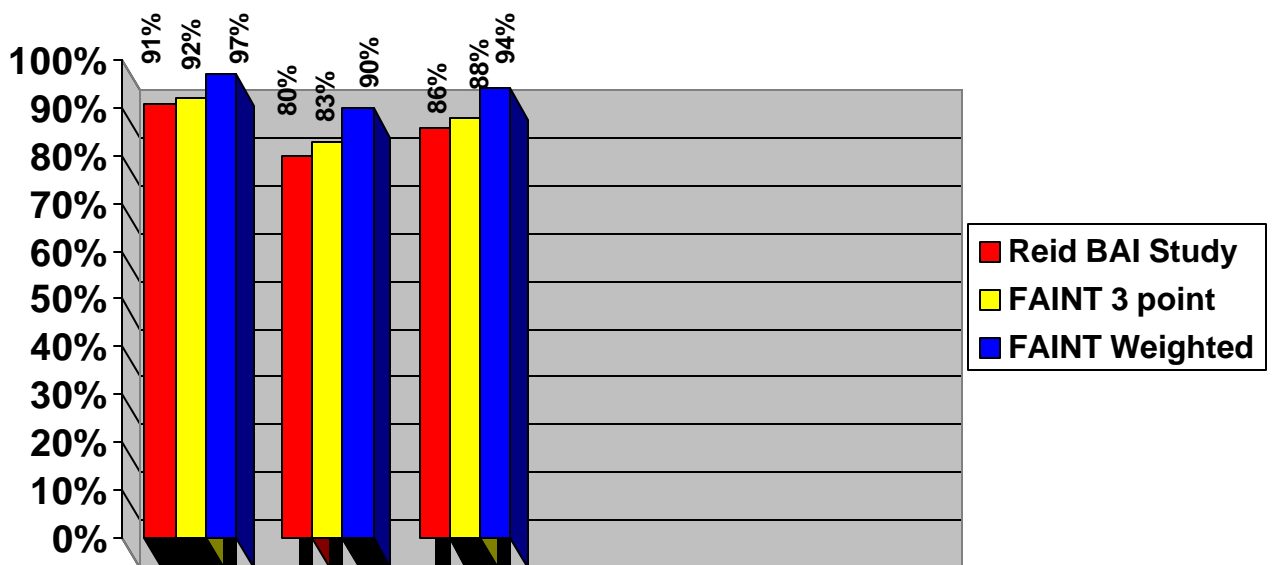
**Table 19 Comparison of the Reid BAI, FAINT 3 point and FAINT weighted scoring systems with Inconclusives considered as errors**



ACCURACY: TRUTHFUL DECEPTIVE INCONCLUSIVE OVERALL

**Table 20 Comparison of Reid BAI, FAINT 3 point and weighted scoring systems with Inconclusives not considered as errors**





ACCURACY: TRUTHFUL DECEPTIVE OVERALL

### 7.3 Recommendations

The above notwithstanding, the following caveat must be considered: The weighted method, although increasing accuracy, resulted in much more positive scores, even for the “deceptive” suspects. This presents no problem when the suspect pool is known to contain the “deceptive” suspect(s). For example, in employee theft case number 11, there were 3 suspects. All of the blind evaluators properly identified the guilty suspect; however, they did

this by selecting the suspect with the lowest score in the group. One evaluator identified this person as being deceptive with a score of +15. While this appears to be an extreme case, it is important that the interviewer in such a case not rule out the possibility that all of the suspects are innocent. In this situation, the FAIN system cannot be the be all and end all. The person with the lowest weighted score should be reassessed using the non-weighted 3 point scale. The interviewer must also look “within” the case information to determine whether a suspect with a very positive score deserves additional investigative focus. The original FAIN interviewer had 100% accuracy in his assessments of these 51 suspects. In fact, it was his ability to look “within” the case information: compare the suspects to each other, identify the suspicions and comments of the suspects, and use this as additional assessment criteria that allowed for the increase in his assessment accuracy.

The research from this study reconfirms that there are demonstrable differences in the way truthful and deceptive suspects use nonverbal, verbal and written behavior when being interviewed by a structured technique.

Further, this study clearly indicates these differences are observable and quantifiable, and that the weighted FAIN is one of the most statistically reliable tools which can be effectively used to evaluate the culpability of an individual suspect. When presented with a case involving multiple suspects FAIN will allow the investigator to focus the investigation on the most likely suspect to have committed the crime.

## **Bibliography**

AFP Worldwide News. Paris, France. September 14, 2003.

Al-Simadi, Fayez A. *Detection of Deceptive Behavior: A Cross-Cultural Test*. Social Behavior and Personality. Volume 28, 455-462, 2000.

Backster, Cleve. *Lecture: Zone Comparison Technique*. 1979 American Polygraph Association Annual Seminar, San Diego, CA

Bekker, Daan. *Interview: Trial by Torture*. Pretoria, South Africa, February 25, 2004.

Brannigan, Christopher, and Humphries, David. "I See What You Mean." *New Scientist*, Volume 42, pp. 406- 408, 1969.

Burgoon J., Butler D., and Woodall W. *Nonverbal Communication: The Unspoken Dialogue*. Harper and Row, New York, 1989.

Cohen, Emanuel, *Interview: Trial by Ordeal*. Philadelphia, PA., June 27, 1997.

Confidential Source. National Police of Saudi Arabia *Interview: Trial by Torture*. September 3, 2003.

Darwin, Charles. *The Expression of the Emotions in Man and Animals*. D. Appleton and Company: New York, 1872.

Eckman, P. and Friesen, W. V. *Nonverbal Leakage Clues To Deception*. *Psychiatry*, Volume 31, Number 1, 88 – 89, 1969.

Eckman, Paul. *Telling Lies*. W. W. Norton and Company. New York, 1992.

Fleisher, William. *Interview: Trial by Ordeal*. Philadelphia, PA, January 7, 1995.

Fuduka, K. *Eye blinks: new indices for the detection of deception*. *International Journal of Psychophysiology*, Volume 40, Number 3, pp 239-45. April, 2001.

Givens, David B. *Website for the Center for Nonverbal Studies*.

<http://members.aol.com/nonverbal2/center.htm#Center20forNonverbal20Studies>.

©1998–2003.

Goleman, Daniel. *Laugh and Your Computer Will Laugh With You, Someday*. New York Times, C1, C9. January 7, 1997.

Gordon, Nathan J., and Fleisher, William L. *Effective Interviewing and Interrogation Techniques*. London: Academic Press, 2002.

Guyton, Arthur C. *Textbook of Medical Physiology, 9th Edition*. W. B. Saunders. Philadelphia, PA 1996.

Horvath, Frank S. *Verbal and Nonverbal Cues to Truth and Deception during Polygraph Examinations*. Journal of Police Science and Administration, Volume 1, No.2, 1973.

Horvath, Frank; Jayne, Brian and Buckley, Joseph. *Differentiation of Truthful and Deceptive Criminal Suspects in Behavior Analysis Interviews*. Journal of Forensic Sciences, JFSCA, Volume 39, Number 3, pp. 793-807. May, 1994.

Iverson, Jana. *Discover*, Volume 20, Number 3. March, 1999.

James, W. *A Study of the Expression of Bodily Posture*. Journal of General Psychology, pp 405-406, 1932.

LeDoux, Joseph. *The Emotional Brain: The Mysterious Underpinnings of Emotional Life*. Simon & Schuster, New York, 1996.

Lesce, Tony. *SCAN: Deception Detection by Scientific Content Analysis*. Law and Order Magazine, Volume 38, Number 8. August 1990.

Matte, James Allen. *Forensic Psychophysiology; Using the Polygraph* Williamsville, New York, JAM Publications, 1996.

McGrew, W. C. *Aspects of Social Development in Nursery School Children with Emphasis on Introduction to the Group*. N. G. Blurton Jones, ed., *Ethological Studies of Child Behaviour*. Cambridge: University Press, pp. 129-56, 1972.

Mehrabian, Albert. "The Anthropology of Posture." *Scientific American* Number 196, 122-132, 1957.

Mehrabian, Albert. *Nonverbal Communication*. Aldine Atherton, Chicago, 1972.

Men's Health Magazine. *Mysteries of Health*. January/February, 2001.

Morris, Desmond. *Body Watching; A Field Guide to the Human Species*. Random House Value Publishers, London, 1985.

Morris, Desmond. *Naked Ape: A Zoologist Study of the Human Animal*. Random House Group. London, 1994.

Niederhofer, Janice. *Lecture: Neurolinguistic Programming*. American Polygraph Association Lecture, 36<sup>th</sup> Annual Seminar, Indianapolis, Indiana, August 7, 2001.

Rosenfeld, Howard. *Nonverbal Reciprocation of Approval: An Experimental Analysis*. Argyle, pp. 163-72, 1973.

Steller, Max. *Assessing Credibility of Children's Statements About Sexual Abuse*.

The Institute of Forensic Sciences, Istanbul University, June 29, 2000.

Szasz, Thomas S. *The Manufacture Of Madness*. New York: Harper and Row, 1970.

Tavor, Daphna. *Lecture: Criteria Based Statement Analysis*. Centurion, South Africa. April 10, 2003.

Travers, Bridgett; Muhr, Jeffrey; Evans, Sarah. *World of Invention*. Gale Group, New York, 1994.

Trovillo, Paul Y. *A History of Lie Detection*. Journal of Criminal Law, Criminology and Police Science, Volume 29 (1939), 848 – 881.

Trovillo, Paul Y. *A History of Lie Detection*. Journal of Criminal Law, Criminology and Police Science, Volume 30 (1939), 104 – 119.

Unknown Participant. *Interview: Seminar on Pre-Employment Interviewing*. South African National Defense Force, Pretoria, South Africa, February, 2001.

Verj, Aldert; Edward, Katherine; Roberts, Kim; and Bull, Ray. *Detecting Deception via Analysis of Verbal and Nonverbal Behavior*. Journal of Nonverbal Behavior, Volume 24, Number 4, 239-263, Winter, 2000.

Willis, William D., Jr. *The Chemical Senses; Physiology*. Mosby, New York, 1998.

**APPENDUM A:** The FAINT interview form using the 3 point scoring scale.

## ***Forensic Assessment Interview*** ©

Name: \_\_\_\_\_ File No.: \_\_\_\_\_  
Address: \_\_\_\_\_ Date of Interview: \_\_\_\_\_  
Client: \_\_\_\_\_

Telephone No. \_\_\_\_\_ Telephone No. \_\_\_\_\_  
 Interviewee Arrived \_\_\_\_\_ Requested By \_\_\_\_\_  
 Interviewee Started \_\_\_\_\_ Oral report To \_\_\_\_\_  
 Interview Ended \_\_\_\_\_ Location of Interview \_\_\_\_\_  
 Interviewer \_\_\_\_\_ Interviewee Left \_\_\_\_\_  
 Verified By \_\_\_\_\_ Investigator Present? Yes No  
 Name \_\_\_\_\_

**CONSENT FORM**

I, \_\_\_\_\_, have been advised, before submitting myself to a Forensic Assessment Interview, on this the \_\_\_\_ day of \_\_\_\_\_, 20\_\_\_\_, that I cannot be forced to submit myself to take a Forensic Assessment Interview for any reason. Furthermore, I have the absolute right to refuse such interview. With full knowledge of these rights and without duress, coercion, force, intimidation, or promises of immunity or reward, I do hereby request a Forensic Assessment Interview be given to me by an Interviewer of Keystone Intelligence Network, Inc., for the mutual benefit of myself and \_\_\_\_\_.

I also authorize the Interviewer of Keystone Intelligence Network, Inc., to disclose both orally and/or in writing, all information, results, conclusions and/or opinions arising from said interview, to \_\_\_\_\_, for whatever uses they may determine. I further authorize Keystone Intelligence Network, Inc., to electronically record this interview for the purposes of review, reporting, research or training. I understand fully that I can terminate this interview anytime I so desire. Intending to be legally bound, I remise, release, waive, and forever discharge all and each of the above corporations, firms, and/or individuals from any and all actions or causes of action, claims or demands, liability or legal action which I may have now or may ever have resulting directly or indirectly, or remotely both by my taking said interview and/or oral or written information, results, conclusions, and/or opinions, rendered because of said Forensic Assessment Interview.

In Witness Whereof, I have Hereunto Set My Hand and Seal

\_\_\_\_\_ WITNESS \_\_\_\_\_ DATE \_\_\_\_\_ (SEAL) Signature of Interviewee \_\_\_\_\_ DATE

This interview was concluded at \_\_\_\_\_, on the above date. Having submitted myself freely to the interview, I hereby reaffirm my agreement as expressed above. I swear that during said interview, I was well treated and remained of my own free will, knowing that I could leave anytime I so desired. I also swear and certify there were no threats, and or harm done to me, or any promises made to me during the entire time that I have been here, either in connection with the interview or the signing of this form.

\_\_\_\_\_ WITNESS \_\_\_\_\_ DATE \_\_\_\_\_ (SEAL) Signature of Interviewee \_\_\_\_\_ DATE

**PERSONAL DATA:**

Age: \_\_\_\_\_ DOB: \_\_\_\_\_ Married: \_\_\_\_\_ Single: \_\_\_\_\_ Separated: \_\_\_\_\_ Divorced: \_\_\_\_\_

Children: \_\_\_\_\_ Driver's License: \_\_\_\_\_ Ever Arrested? YES NO

If yes, explain: \_\_\_\_\_

When asked to do interview? \_\_\_\_\_ By Whom: \_\_\_\_\_

How far did you go in school? 1 2 3 4 5 6 7 8 9 10 11 12 Did you graduate? YES NO

College: \_\_\_\_\_ Years Attended: \_\_\_\_\_ Degree \_\_\_\_\_

Military Service: \_\_\_\_\_ Years: \_\_\_\_\_ Type Discharge: \_\_\_\_\_

**MEDICAL DATA:**

Have you been hospitalized in the last five years? YES NO

If yes explain: \_\_\_\_\_

Under the care of a physician at this time? YES NO

If yes explain: \_\_\_\_\_

Taking any medication at this time? YES NO

If yes explain: \_\_\_\_\_

Do you have any pain or discomfort at this time? YES NO

If yes explain: \_\_\_\_\_

Do you know of any reason you would have difficulty understanding my questions and answering them coherently? YES NO If yes explain: \_\_\_\_\_

**MISCELLANEOUS:**

How many hours sleep did you get last night? \_\_\_\_\_ Sleep soundly? YES NO

If no explain: \_\_\_\_\_

In the past 24 hours have you had any alcohol/used any illegal substances? YES NO

If yes explain: \_\_\_\_\_

**POSTURE/DEMEANOR (+1 Truthful/0 Inconclusive/-1 Deceptive)**

Score: (+) (0) (-)

If using MITT do it now and issue one overall score:

Score: (+) (0) (-)

**ELICITED VERBAL RESPONSES**

(+1 Truthful/0 Inconclusive/-1 Deceptive)

1a. Where do you work?

\_\_\_\_\_



---

1b. How long have you worked there/here?

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---

2. What do you do?

---

---

3. How do you like working there/here?

---

**Score: (+) (0) (-)**

4. What is this interview and investigation about?

---

---

**Score: (+) (0) (-)**

5. Why were you selected to be interviewed?

---

---

**Score: (+) (0) (-)**

6. How do you feel about being interviewed?

---

---

**Score: (+) (0) (-)**

7. Please write/tell me in detail what you know about this and how you would explain it.

---

---

**Score: (+) (0) (-)**

8. If you were the investigator, how would you conduct the investigation?

---

---

**Score: (+) (0) (-)**

9. What are the five most important causes that would have created this situation?

---

---

**Score: (+) (0) (-)**

10. Did you ever think about doing something like this?

---

---

**Score: (+) (0) (-)**

11. (Comparison) During the first \_\_\_ years of your life did you ever

---

---

12. Did you

---

---

**Score: (+) (0) (-)**

13. (Comparison) In your entire life did you ever

---

---

14. Who would you suspect?

---

---

**Score: (+) (0) (-)**

15. Who would you vouch for?

---

---

**Score: (+) (0) (-)**

16. When the person who did this is caught, what do you think should happen to them?

---

---

**Score: (+) (0) (-)**

17. Would you give them a second chance?

---

---

**Score: (+) (0) (-)**

18. We will be doing a thorough investigation: interviewing everyone, forensic tests.  
How do you think the investigation will come out concerning you, and whether or  
not you did this?

---

---

**Score: (+) (0) (-)**

19. Would there be any reason evidence would turn up indicating you did this?

---

---

**Score: (+) (0) (-)**

20. Would you be willing to chip in to pay for \_\_\_\_\_?

---

---

**Score: (+) (0) (-)**

21. Did you tell anyone about what happened and that you had to be interviewed?

---

---

**Score: (+) (0) (-)**

22. Why do you think someone would do something like this?

---

---

**Score: (+) (0) (-)**

23. Do you think it was done deliberately, or could it have been accidental?

---

---

**Score: (+) (0) (-)**

24. Do you know for sure who did this?

---

---

25. In your entire life, did you ever tell a lie to get out of trouble ?

---

---

26. Did you lie about whether or not you did this?

---

---

**Score: (+) (0) (-)**

27. If you had been the interviewer, and had three questions to ask to resolve this problem, what would you have asked?

---

---

**Score: (+) (0) (-)**

28. If we need to speak with you again would you be willing to return?

---

---

**Score: (+) (0) (-)**

## **AFTER INTERVIEW INTERVIEW**

How do you feel now that the interview is over?

---

---

Should I believe your answers? (Note: Must answer "Yes" here to be considered for a +1)

---

If yes, give me one reason why.

---

What would you say if the investigation proves you did this?

---

---

What were your emotions during the interview?

---

---

Were you afraid?

---

If you were asked to pay, how much would you be willing to pay?

---

Score: (+) (0) (-)

**NOTE: To receive a +1 must answer question #2 "Yes," and then say : "I did not lie, I told the truth, I did not do the crime," as part of their answer to any other question.**

**TOTAL SCORES FROM ALL PAGES: \_\_\_\_\_**

**APPENDUM B:** The FAINT interview form using the weighted scoring scale.

***Forensic Assessment Interview*** ©

Name: \_\_\_\_\_ File No.: \_\_\_\_\_  
 Address: \_\_\_\_\_ Date of Interview: \_\_\_\_\_  
 \_\_\_\_\_ Client: \_\_\_\_\_  
 \_\_\_\_\_ Telephone No. \_\_\_\_\_  
 Telephone No. \_\_\_\_\_ Requested By \_\_\_\_\_  
 Interviewee Arrived \_\_\_\_\_ Oral report To \_\_\_\_\_  
 Interviewee Started \_\_\_\_\_ Location of Interview \_\_\_\_\_  
 Interview Ended \_\_\_\_\_ Interviewee Left \_\_\_\_\_  
 Interviewer \_\_\_\_\_ Investigator Present? Yes No  
 Verified By \_\_\_\_\_ Name \_\_\_\_\_

---

**CONSENT FORM**

I, \_\_\_\_\_, have been advised, before submitting myself to a Forensic Assessment Interview, on this the \_\_\_\_ day of \_\_\_\_\_, 20\_\_, that I cannot be forced to submit myself to take a Forensic Assessment Interview for any reason. Furthermore, I have the absolute right to refuse such interview. With full knowledge of these rights and without duress, coercion, force, intimidation, or promises of immunity or reward, I do hereby request a Forensic Assessment Interview be given to me by an Interviewer of Keystone Intelligence Network, Inc., for the mutual benefit of myself and \_\_\_\_\_.

I also authorize the Interviewer of Keystone Intelligence Network, Inc., to disclose both orally and/or in writing, all information, results, conclusions and/or opinions arising from said interview, to \_\_\_\_\_, for whatever uses they may determine. I further authorize Keystone Intelligence Network, Inc., to electronically record this interview for the purposes of review, reporting, research or training. I understand fully that I can terminate this interview anytime I so desire. Intending to be legally bound, I remise, release, waive, and forever discharge all and each of the above corporations, firms, and/or individuals from any and all actions or causes of action, claims or demands, liability or legal action which I may have now or may ever have resulting directly or indirectly, or remotely both by my taking said interview and/or oral or written information, results, conclusions, and/or opinions, rendered because of said Forensic Assessment Interview.

In Witness Whereof, I have Hereunto Set My Hand and Seal

\_\_\_\_\_  
 WITNESS DATE (SEAL) Signature of Interviewee DATE

This interview was concluded at \_\_\_\_\_, on the above date. Having submitted myself freely to the interview, I hereby reaffirm my agreement as expressed above. I swear that during said interview, I was well treated and remained of my own free will, knowing that I could leave anytime I so desired. I also swear and certify there were no threats, and or harm done to me, or any promises made to me during the entire time that I have been here, either in connection with the interview or the signing of this form.

\_\_\_\_\_  
 WITNESS DATE (SEAL) Signature of Interviewee DATE

**PERSONAL DATA:**

Age: \_\_\_\_\_ DOB: \_\_\_\_\_ Married: \_\_\_\_\_ Single: \_\_\_\_\_ Separated: \_\_\_\_\_  
 Divorced: \_\_\_\_\_

Children: \_\_\_\_\_ Driver's License: \_\_\_\_\_ Ever Arrested? \_\_\_YES \_\_\_NO

If yes, explain: \_\_\_\_\_

When asked to do interview? \_\_\_\_\_ By Whom: \_\_\_\_\_

How far did you go in school? 1 2 3 4 5 6 7 8 9 10 11 12 Did you graduate? \_\_\_YES  
\_\_\_NO

College: \_\_\_\_\_ Years Attended: \_\_\_\_\_ Degree \_\_\_\_\_

Military Service: \_\_\_\_\_ Years: \_\_\_\_\_ Type Discharge: \_\_\_\_\_

**MEDICAL DATA:**

Have you been hospitalized in the last five years? \_\_\_YES \_\_\_NO

If yes explain: \_\_\_\_\_

Under the care of a physician at this time? \_\_\_YES \_\_\_NO

If yes explain: \_\_\_\_\_

Taking any medication at this time? \_\_\_YES \_\_\_NO

If yes explain: \_\_\_\_\_

Do you have any pain or discomfort at this time? \_\_\_YES \_\_\_NO

If yes explain: \_\_\_\_\_

Do you know of any reason you would have difficulty understanding my questions and answering them coherently? \_\_\_YES \_\_\_NO

If yes explain: \_\_\_\_\_

**MISCELLANEOUS:**

How many hours sleep did you get last night? \_\_\_\_\_ Sleep soundly? \_\_\_YES \_\_\_NO

If no explain: \_\_\_\_\_

In the past 24 hours have you had any alcohol/used any illegal substances? \_\_\_YES  
\_\_\_NO

If yes explain: \_\_\_\_\_

**POSTURE/DEMEANOR (+1 Truthful/0 Inconclusive/-1 Deceptive) Score: (+) (0) (-)**  
**If using MITT do it now and issue one overall score: Score: (+) (0) (-)**

**ELICITED VERBAL RESPONSES**

1a. Where do you work?

\_\_\_\_\_  
\_\_\_\_\_

1b. How long have you worked there/here?

---

---

2. What do you do?

---

---

3. How do you like working there/here?

---

---

**(Positive Answer/No Hesitation-Adaptors-Coding) Score: (+3) (0)**

4. What is this interview and investigation about?

---

---

**(Strong Language: Steal/Theft/Rape) Score: (+2) (-2)**

5. Why were you selected to be interviewed?

---

---

**(Includes self as Suspect) Score: (+1) (0)**

6. How do you feel about being interviewed?

---

---

**(Positive Answer with No Hesitation/No Adaptors) Score: (+2) (0)**

7. Please write/tell me in detail what you know about this and how you would explain it.

---

---

**(Explains Crime with Strong Language/Proper Use of Pronouns) Score: (+1) (-2)**

8. If you were the investigator, how would you conduct the investigation?

---

---

**Score: (+1) (0) (-1)**

9. What are the five most important causes that would have created this situation?

---

---

**Score: (+1) (0) (-1)**

10. Did you ever think about doing something like this?

---

---

**(No Hesitation-Adaptors) Score: (+1) (-1)**

11. (Comparison) During the first \_\_ years of your life did you ever

---

---

12. Did you

---

---

Score: (+1) (0)

(-1)

13. (Comparison) In your entire life did you ever

---

---

14. Who would you suspect?

---

---

Score: (+3) (0)

15. Who would you vouch for?

---

---

Score: (+2) (0)

16. When the person who did this is caught, what do you think should happen to them?

---

---

*(Strong Punishment: fired/prosecution)* Score: (+2) (-1)

17. Would you give them a second chance?

---

---

*("No" with out any hesitation)* Score: (+2) (-1)

18. We will be doing a thorough investigation. We will interview everyone, conduct forensic tests. How do you think the investigation will come out concerning you, and whether or not you did this?

---

---

*(Positive Answer)* Score: (+2) (-1)

19. Would there be any reason evidence would turn up indicating you did this?

---

---

*("No with out any Hesitation-Hedges)* Score: (+2) (-1)

20. Would you be willing to chip in to pay for \_\_\_\_\_?

---

---

Score: (+3) (-1)

21. Did you tell anyone about what happened and that you had to be interviewed?

---

---

22. Why do you think someone would do something like this?



---

---

*(Negative/Condescending/I don't know)*      **Score: (+1) (0)**

23. Do you think it was done deliberately, or could it have been accidental?

---

---

**Score: (+3) (0)**

24. Do you know for sure who did this?

---

---

*("No," with no hesitations or adaptors)*      **Score: (+2) (0)**

25. In your entire life, did you ever tell a lie to get out of trouble?

26. Did you lie about whether or not you did this?

---

---

**Score: (+) (0) (-)**

27. If you had been the interviewer, and had three questions to ask to resolve this problem, what would you have asked?

---

---

**(Asks a strong relevant question: "Did I do it.")      Score: (+1) (0)**

28. If we need to speak with you again would you be willing to return?

**AFTER INTERVIEW INTERVIEW**

How do you feel now that the interview is over?\_\_\_\_\_

Should I believe your answers? (**Note: Must answer "Yes" here to be considered for a +3**)

---

If yes, give me one reason why.

---

What would you say if the investigation proves you did this?

---

What were your emotions during the interview?

---

Were you afraid? \_\_\_\_\_

If you were asked to pay, how much would you be willing to pay?

---

**Score: (+3) (0)**

**NOTE: To receive a +3: must answer Question #2 "Yes," and then say: "I did not lie", "I told the truth", "I did not do the crime" as part of their answer to any other question.**

**TOTAL SCORES FROM ALL PAGES: \_\_\_\_\_ DETERMINATION: NDI ? DI**