Edge Level C
Unit 4
Cluster 1
“Face Facts: The Science of Facial Expressions”

1. Which group has been taught to read the clues in facial expressions?

   A. firefighters
   B. judges
   C. DEA agents
   D. border patrol officers

   LA.910.1.7.3
The correct answer is B. Options A, C, and D are incorrect because they represent details that do not support the question being assessed.

   **Option A** is incorrect because firefighters have not been taught facial recognition (page 355). **Option B** is correct because on page 355 the reader is told that Ekman and his colleagues have taught judges to read clues in facial expressions. **Option C** is incorrect because although FBI and CIA agents have been taught facial recognition, DEA agents have not (page 355). **Option D** is incorrect because although airport security officers have been taught facial recognition, border patrol officers have not (page 355).

2. According to the text and the illustration on page 354, which muscle is used when we chew food?

   F. Masseter
   G. Risorius
   H. Orbicularis oris
   I. Frontalis

   LA.910.2.2.1
The correct answer is F. Options G, H, and I are incorrect because they represent incorrect analysis and interpretation of text features.

   **Option F** is correct because on page 354 readers are told that the masseter muscle raises the jaw and causes teeth to clench which is what happens when we chew. The Collins English Dictionary at thefreedictionary.com defines *masseter* as *a muscle of the cheek used in moving the jaw, especially in chewing*. **Option G** is incorrect because the risorius muscle stretches the mouth horizontally which is not an action used in chewing. **Option H** is incorrect because the orbicularis oris muscle opens and closes the eyes, an action not necessary in chewing. **Option I** is incorrect because the frontalis muscle moves eyebrows and forehead upward, not an action used in chewing.
3. According to the article, what could be considered a 21st century use of the result of Dr. Ekman’s research with the Fore people in 1967?

A. social scientists are describing and categorizing the basic facial expressions
B. United State Secret Service Agents are being trained to better protect the President
C. the Department of Defense is developing computer technology that can scan and analyze facial movements
D. computer programmers are creating animations of people that are more realistic and life-like for computer games and movies

LA.910.6.2.2
The correct answer is C. Options A and B are incorrect because they represent facts and details drawn from the text but unrelated to the question being tested. Option D is incorrect because it is a plausible but incorrect distractor based on the text.

Option A is incorrect because as the reader learns on page 356 social scientists have already “…shown that facial expressions across the globe fall roughly into seven categories…” The Fore people may be part of that research, but the categorization of expressions is not new. Option B is incorrect because the reader learns on page 359 “…United States Secret Service agents tend to be better than average… (at distinguishing) “…a lying face from a truthful one about 80 percent of the time.” which is interesting information, but does not relate to the question. Option C is correct because the reader learns on page 355 that Dr. Ekman “…is now an adviser for the Department of Defense, which is developing computer technology that can scan and analyze facial movements on videotape.” This is possible because of the conclusion of Dr. Ekman and other social scientists including and following the Fore people research. Option D is incorrect because whether it is true or not, it is not part of the information included in the article.

4. As a result of participating in one of Dr. Ekman’s weeklong classes, what is one skill a law enforcement office may have learned?

F. to read and understand the meaning behind the gestures of suspects
G. how to tell a high-stakes lie when serving in an undercover investigation
H. how to recognize when a witness is lying under oath in court
I. when to ask tricky questions of a suspect so that he will reveal the truth

LA.910.1.7.4
The correct answer is F. Options G, H, and I are incorrect because they represent incorrect causal relationships based on the text.

Option F is correct because on page 358 the reader learns, “Ekman’s weeklong classes teach law enforcement officers …to interpret voices and gestures.” Option G is incorrect because on page 358 the reader learns that law enforcement officers are being taught to “…spot asymmetries…that are often a sign of conscious lying… (and that)... High stakes lies … are difficult to cover up.” They are being taught to recognize a lie, not how or when to tell one. Option H is incorrect because on page 358 the reader learns that “…it’s important that police and security officers learn to spot a liar on first contact. ‘By the time something gets to court, the lie has been rehearsed.’” In other words, the goal is to detect the lie when it is first told, not
when it is rehearsed and repeated in court. **Option I** is incorrect and although readers are told that part of the weeklong class is how to ask questions, that is not discussed in the article.

5. Why does Ekman not want to publicize all of his research?

   A. He is a shy and self-conscious man who does not seek personal publicity or notoriety.
   B. His goal is to make law enforcement officers better prepared not to make it easier for criminals or terrorists to hide their feelings or their intentions.
   C. He prefers to teach various law enforcement agency personnel how to detect criminal activity as opposed to doing more research and publishing his conclusions.
   D. He is worried that other social scientists would duplicate his research and draw different conclusions.

**LA.910.1.7.4**
The correct answer is **B**. Options A, C, and D are incorrect because they represent plausible but incorrect distractors based on the text.

**Option A** is incorrect because it includes information not part of the article and unknown to the reader. **Option B** is correct because it summarizes his feelings that are described on page 360. **Option C** is incorrect because although he does teach law enforcement personnel, it is not done instead of him continuing his research. He wants to continue to do research, and on page 359 the reader learns that his “…next challenge is to identify more specific expressions of anger.” **Option D** is incorrect because this is not mentioned or implied in the article.

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6. Based on the main headings and subheadings in the magazine article, the reader can determine that the main organizational structure of the article is

   F. a comparison of how we make good or bad impressions on others.
   G. an assortment of descriptions of how people should act in group settings.
   H. a set of common body language blunders and suggestions of how to correct them.
   I. a compilation of anecdotes of situations where poor body language was observed.

**LA.910.1.7.5**
The correct answer is **H**. Options F, G, and I are incorrect because they represent incorrect interpretations of text structures/organizational patterns.

**Option F** is incorrect because although the problem/solution organization of the article includes only incidental references to good/bad impressions; they are not part of the organizational structure. **Option G** is incorrect because although body language information may help the
reader behave more appropriately in a group setting; this is not part of the organizational structure. Option H is correct because on page 365 the reader learns, “Below, you’ll find help for some of the most common body language goofs.” The remainder of the article is grouped by sections with the heading of a “goof” and then subheads to identify the specific problem and how to fix it. Option I is incorrect because although brief anecdotes may be included to provide additional explanations; they are not part of the organizational structure.

7. Look at the boy shown in the left-hand picture at the bottom of page 366. Using what you learned in the articles “Face Facts: The Science of Facial Expressions” and “Silent Language,” what do you think he feels?

A. fear
B. anger
C. sadness
D. contempt

LA.910.6.2.2
The correct answer is C. Options A, B, and D are incorrect because they represent incorrect synthesis of information.

Option A is incorrect because on page 357 the reader learns that the boy showing fear has wide-open eyes, his upper lids rise, and his eyebrows also rise—this is not shown on the face of the boy on page 366. Option B is incorrect because on page 357 the reader learns that in an angry expression the eyelids tighten, the eyebrows lower and draw together, and the lips press together—this is not shown on the face of the boy on page 366. Option C is correct because the facial expression of the boy on page 366 is most like that illustrating sadness on page 357. Option D is incorrect because on page 357 the reader learns that the illustration of contempt is described as the only expression that occurs on just one side of the face—this is not shown on the face of the boy on page 366.

8. Which is NOT a feature of nonverbal communication?

F. vocal tone and pitch
G. facial expressions
H. body movement
I. gestures

LA.910.1.7.3
The correct answer is F. Options G, H, and I are incorrect because they represent incorrect inferences or conclusions based on details found in the text.

Definitions are from macmillandictionary.com which defines nonverbal as not involving words or speech. Option F is correct because nonverbal communication is silent communication, and, by definition, would not include vocal communication. Vocal is defined as relating to the voice, or done with the voice. Option G is incorrect because facial expressions are a type of nonverbal communication. A facial expression is defined as a look on someone’s face that shows what their thoughts or feelings are. Option H is incorrect because body movements are a type of
nonverbal communication. A body movement is defined as a change in the position of your body, or a particular way of moving your body. Option I is incorrect because gestures are a type of nonverbal communication. Gesture is defined as a movement that communicates a feeling or instruction.

9. What was the author’s purpose in writing this magazine article?

A. to categorize the most important features of silent communication so that the reader can tell what others are really thinking
B. to help law enforcement officers, judges, and teachers learn how to identify the inconsistencies between the way people behave and what they say
C. to relate the research on facial expressions to the research on body positioning and gestures in order to ensure that a listener really “hears” the message
D. to make the reader aware of the importance of body language and how to correct common errors in non-verbal behavior

LA.910.1.7.2
The correct answer is D. Options A, B, and C are incorrect because they represent facts and details that do not support the author’s purpose or represent the author’s perspective.

Option A is incorrect because the author’s purpose is not to simply list forms of non-verbal communication. Option B is incorrect because the author does not address any specific group who needs to learn about inconsistencies between verbal and nonverbal messages; if any group is targeted, it is probably youth. Option C is incorrect because research on facial expressions is not a topic of this article; however, body positions and gestures are details mentioned in the article. Option D is correct because this is the purpose of the article, as the author says on page 365, “Your gestures and posture say more than you know. Indeed, body language is the single most important means of getting a point across, say experts.”

10. What form of body language causes other people to think you are NOT sure of yourself?

F. standing with one hand in your pocket and the other free to make gestures
G. looking around the group to see if anyone is watching you
H. standing or sitting tall with your chin up
I. maintaining pleasant eye contact with the person talking to you

LA.910.1.7.4
The correct answer is G. Options F, H, and I are incorrect because they represent incorrect causal relationships based on the text.

Option F is incorrect because as Carmine Gallo says on page 366, “…putting one hand in your pocket…having the other hand free to gesture makes you seem more confident.” Option G is correct because on page 366 the author says that looking around the room when you’re in a group of three or more “…comes across as arrogant or rude.” Option H is incorrect because on page 367 Debra Fine says that “Poor posture almost shouts…I don’t feel competent…once you improve your posture, you’ll feel more confident.” Option I is incorrect because on page 365 the author says, “Refusing to meet someone’s eye says that you’re unconfident…”