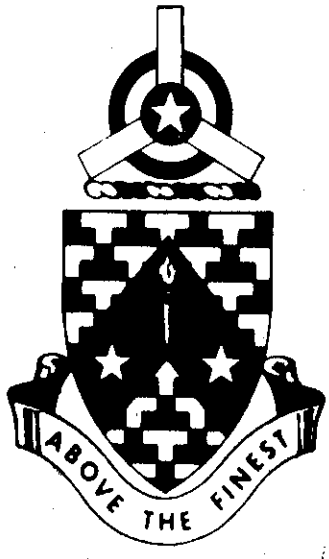
PROGRAMED TEXT

FOG

AM-72



JANUARY 1969

UNITED STATES ARMY

PRIMARY HELICOPTER SCHOOL

FORT WOLTERS, TEXAS

PROGRAMED TEXT

PROGRAM TEXT

FILE NO:

AM-72

PROGRAM TITLE

FOG

POI SCOPE: Types of fog and factors necessary for formation and dissipation; flight procedures when fog has been forecasted or encountered enroute; and the enroute weather aids available to the aviator.

INSTRUCTOR REFERENCES:

TM 1-300 Chapter 8

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February 1969

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PREFACE

Fog is a serious hazard during take-offs and landings because it restricts surface visibility. A knowledge of fog types and of formation and dissipation processes will enable the Army aviator to plan his flight more effectively.

Start with FRAME 1 and work each frame in succession. Each frame will usually ask you a question. The correct answer is printed on the top of the next frame. If you were incorrect, turn back and restudy the information before continuing on to the next frame. When you have finished the text, complete the Self Evaluation Exercise. Now begin by studying the Performance Objectives on page iv.

PERFORMANCE OBJECTIVES

Upon completion of the program, without references, you will be able to:

1. Identify factors and conditions necessary for the formation of the following types of fog: radiation (ground), upslope, advection, steam, and frontal.

2. List the factors necessary for fog dissipation.

3. Determine from a teletype sequence report, any position along your route where fog will likely form.

4. List the recommended flight procedures to be employed when fog has been forecasted or encountered enroute or at your destination.

5. Specify enroute weather aids, to include SIGMETS, AIRMETS, PIREPS, NOTAMS and Scheduled Weather Broadcasts, that may be monitored in flight to provide information about weather.

INFORMATION FRAME 1

Basically, all fog is found as the temperature and the dew point are brought close together. This is accomplished either by the air temperature being lowered close to that of the dew point through some cooling process, or by raising the dew point to reach the air temperature through evaporation.

Of the five types of fog listed in the Performance Objectives, radiation (ground) fog, upslope fog, and advection fog are formed by the air temperature being lowered as the air is cooled. Steam fog and frontal fog are formed as a result of the dew point being raised through evaporation.

FRAME 8 Answers.

1. c. (Cooling, see Frames 2 through 5)
2. a. (Evaporation, see Frames 6 and 7)
3. c. (Overabundance of nuclei, see Frame 2)
4. a. (Colder half of the year, see Frame 5)
5. a. (Wind continues to blow in warm moist air, see Frame 5)
6. b. (Windward side (Adiabatic process) see Frame 4)
7. d. (100 miles ahead and prefrontal fog, see Frame 7)
8. b. (Steam fog, see Frame 6)

TURN TO FRAME 9 PAGE 4

FRAME 2

Fog is defined as a stratiform cloud with its base at the earth's surface or below 50 feet absolute altitude.

Conditions Condusive to Fog Formation

(1) High relative humidity is of prime importance in the formation of fog since neither condensation nor sublimation will occur unless the RH is near 100 percent.

(2) Light wind (3-5K) is generally favorable for fog formation. It causes a gentle lifting action which spreads surface cooling through a deeper layer of air and increases the thickness of the fog. If no wind exists, and other factors favor fog formation, only dew, frost (below freezing temperatures), or a shallow layer of fog will form.

(3) Condensation nuclei or impurities in the air provide a base around which moisture condenses. In an area where these nuclei are in great abundance (i.e. industrial area), persistent fog may occur with above average temperature - dew point spreads.

Fog Dissipation

Fog tends to dissipate when the relative humidity decreases. This is caused by:

(1) Strong winds (above 7K) which mix the fog with dry air from aloft. The mixing widens the temperature - dew point spread and the fog evaporates near the surface.

(2) Heating from daytime solar radiation or by the adiabatic process as air flows downslope. Heating raises the temperature above the dew point temperature, and the fog evaporates.

Mineral Wells airport has been rendered inoperable by a dense fog layer for the past two hours. Which of the following conditions may dissipate the existing fog?

a. All the factories in Mineral Wells cease operation.

b. The wind increases to 10 knots.

c. A large fire developes up wind of the fog area.

TURN TO PAGE 5 FOR FRAME 3

FRAME 9

As an Army aviator you will be able to look at a teletype sequence report for your destination and along your route and determine if there would be a possibility of fog formation at your estimated time of arrival (ETA).

Lets take a quick review of a teletype sequence report before starting.

station	sky cover and ceiling	visibility	obstruction to vision	pressure in mb	temperature	dew point	wind and direction	altimeter setting	remarks section
DIA	M3	½	VRW	-15	2	68	1605	996	RB 15 DAH NW VSBY ½

V 3/4

Remember, a high humidity (high moisture content) would mean a narrow spread between the temperature and the dew point. The higher the humidity, the more narrow the spread. At 100% relative humidity it would look like this: 68/68, or 50/50 etc. The temperature and dew point are identical.

In a heavy industrial area, fog could form with a 4 degree spread. In other areas fog will not start forming with more than 2 degrees spread. A heavy dense fog would have 100% relative humidity and the temperature dew point would be the same.

SITUATION:

You are at Mineral Wells (MWL) checking the 2300 (local time) sequence in preparation for an early morning cross-country training flight. You plan to depart MWL at 0500 local time. Your flying time will be between one and two hours.

Put the stations in two groups, one where you think fog will not form at your ETA, and the other group where you expect fog to form at your ETA.

ABI 015 132/62/58/1604/812

SPS M1003R- 121/65/63/1606/995

GTH M12010012 036/39/37/2920G32/963/PRESRR RE40

ADM M12035010 961/54/49/2720G30/941/CIG RGD APRNT FROPA

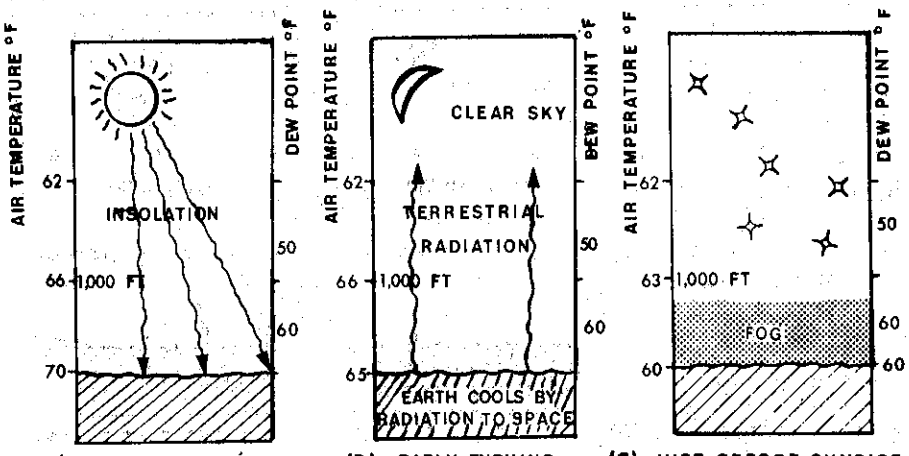
EWK M0037012 05A/60/59/2720G39/968/RB17E23B40E48 RWU NE AND NW

Possible fog formation [redacted] DIA, ABI SPS.

Fog will not form [redacted] GTH, EWK, ADM

TURN TO PAGE 6 FOR FRAME 10

FRAME 2. ~~Answer (b. wind increase)~~



FRAME 3

RADIATION FOG (GROUND FOG)(FORMED BY COOLING)

Radiation fog (commonly called ground fog) forms after the earth has re-radiated back to space the heat gained during daylight hours. By early morning the temperature at the surface may drop more than 20 degrees Fahrenheit. Since the dew point temperature of the air normally changes only a few degrees during the night, the temperature-dew point spread will decrease as the air is cooled by contact with the cold surface. If the radiational cooling is great enough, and other conditions are favorable, radiation fog will form. This formation will usually take place 1 to 3 hours before sunrise and the fog will dissipate 1 to 3 hours after sunrise.

Radiation fog is most likely when the:

(1) sky is clear (Maximum radiational cooling).
(2) moisture content is high (Narrow temperature-dew point spread). Fog is rare when the spread is more than 4 degrees Fahrenheit; it is most frequent when the spread is less than 2 degrees Fahrenheit.
(3) wind is light (Less than 7 knots). High winds will dissipate fog; calm winds will cause either a shallow layer (knee deep) or only dew.

The most dense fog occurs when the temperature and dew point are the same (Relative humidity 100%).

Using the teletype sequence below, how many degrees would the temperature have to decrease in order to have a dense formation of fog?

MVL 015+ 152/78/68/2885/991

a. 10 degrees Fahrenheit
b. 4 degrees Fahrenheit
c. 2 degrees Fahrenheit
d. 0 degrees Fahrenheit

TURN TO PAGE 7 FOR FRAME 4

FRAME 9. Answer. Possible fog formation -- ABI, SPS
No fog -- GTH, ADM, EWX

Did you consider the time when checking the sequence reports and your estimated time of departure? Temperature will decrease several degrees before morning, a clear night will accelerate terrestrial radiation (cooling of the earth). GTH, ADM, and ADS have strong winds, which would prevent fog formation.

FRAME 10 RECOMMENDED FLIGHT PROCEDURES FOR FOG

Planning technique: In predicting the formation of fog, the most reliable method is to look for conditions that may bring about saturation of the air at the surface. For example, planning a long distance flight with a late evening landing. If the sequence reports show a small temperature-dew point spread, light winds, and no cloud cover, there is an excellent possibility that radiation fog will form in the evening as the earth cools.

If a station is expecting a warm-frontal passage, there is a good possibility that there will be fog at the station during the hours preceding the frontal passage (prefrontal fog). A look at the surface weather map will show the extent of fog associated with the front.

In regions where large-scale advection fog is likely, a study of present and predicted winds, coupled with a study of temperatures in the area, will normally give a reasonable estimate of the possibility of fog.

The most important point to remember when planning a flight into areas where fog may form is the flight plan must include an alternate airfield or airfields that will be free of fog and will offer safe landing conditions.

Fog is sometimes difficult to forecast and may be an unexpected landing hazard. If an aviator, upon reaching a destination, finds that fog has formed and the ceiling and visibility are below minimums, he should immediately proceed to the alternate field.

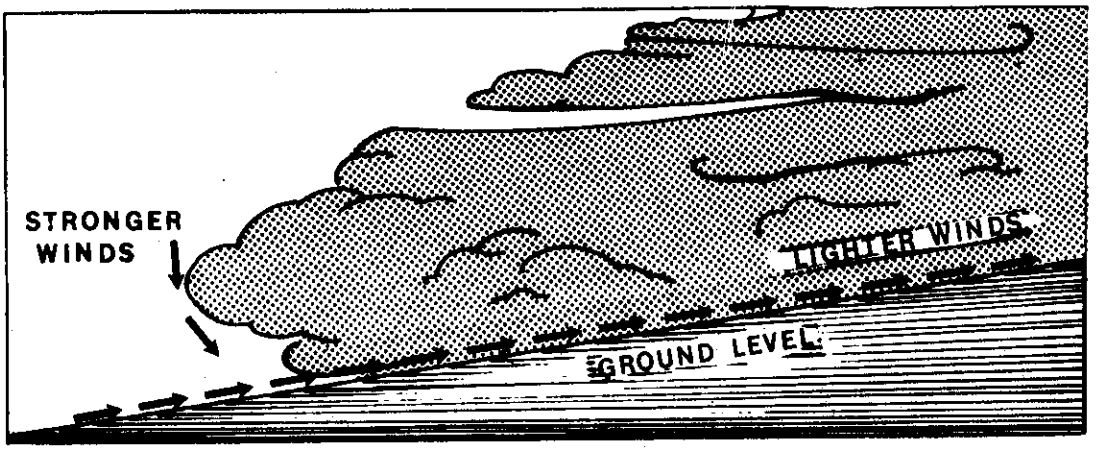
The old adage "to be forewarned is to be forearmed" also applies to flying weather. The importance of having an alternate course of action in mind in the event unsuitable weather develops can hardly be over-emphasized.

Weatherwise, "alternate action" is any change in a flight plan made to avoid or minimize the effects of adverse weather.

If you were flying in Southwest USA to a destination airport and you suspected radiation fog might form, what three factors would you look for? light winds, dew point, high humidity, clear sky

TURN TO PAGE 8 FOR FRAME 11

FRAME 3. Answer (a. 10 degrees Fahrenheit)



Upslope fog -- Stronger winds and turbulance lift fog layer as a stratus cloud.

FRAME 4

UPSLOPE FOG (adiabetic cooling)

Upslope fog is formed by the movement of stable air up a sloping land surface. As the illustration above indicates, the air rises up the slope and is cooled by expansion (adiabetic cooling). When this cooling is sufficient to produce condensation, fog forms. An upslope wind is necessary for the formation and maintenance of upslope fog. As with other types of fog, when the wind becomes quite strong the fog lifts and becomes low stratus clouds. (See diagram above, left side.)

This type of fog is frequently observed on the high plateaus and eastern slopes of the Rockies when easterly winds from the Mississippi Valley and Gulf Coast ascend the slopes. They also occur on the Piedmont, east of the Appalachins.

If stable moist air is lifted upslope and the air cools adiabatically (3 degrees Centigrade per 1,000 ft.) and reaches the saturation point, any further lifting and cooling will cause:

a. condensation.
b. precipitation.
c. sublimation.
d. fusion.

FRAME 10. Answer. calm winds, clear skies, and high humidity.

FRAME 11

IN FLIGHT BROADCASTS

a. Weather Broadcasts

All flight service stations that have voice facilities on continuously operated navigational aids broadcast weather reports and other airway information at intervals of 15 and 45 minutes past each hour.

1. The broadcast at 15 minutes past the hour consists of weather reports from stations within approximately 150 miles of the broadcasting station.

2. The broadcast at 45 minutes past the hour consists of weather reports from important terminals located on airways within approximately 400 miles of the broadcasting station.

b. SIGMETS

SIGMETS is an in-flight advisory report concerning significant meteorological developments of such intensity as to be potentially hazardous to all aircraft in flight, e.g.; tornadoes, squall-lines, hail (three-fourths of an inch and larger), severe turbulence, heavy icing, and widespread duststorms or sandstorms that reduce visibility to less than 2 miles. SIGMET advisories are broadcast upon receipt and at 15 minute intervals thereafter, beginning on the hour, throughout the valid period.

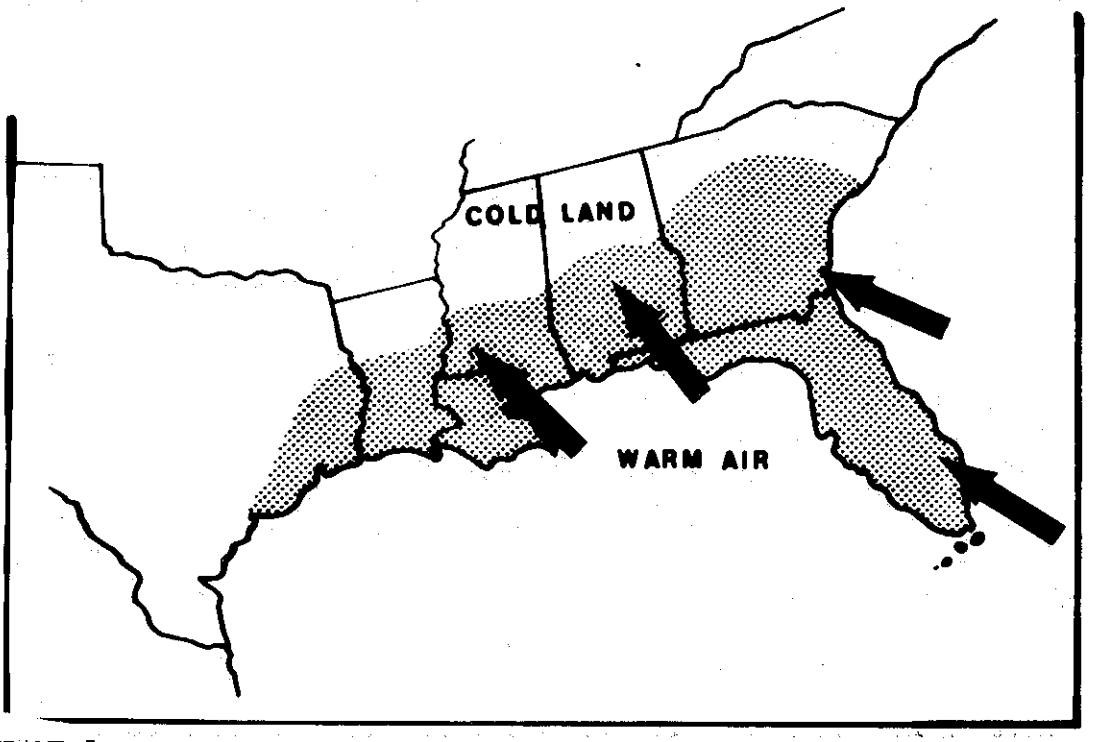
c. AIRMETS

AIRMETS are reports concerning weather of an intensity potentially hazardous to aircraft weighing 12,500 pounds or less. These broadcasts may include conditions involving moderate icing, moderate turbulence, weather that produces extensive areas where visibility is less than 2 miles or ceilings less than 1,000 feet, and wind of 40 knots or greater which are located within 2,000 feet of the surface. This advisory is broadcast upon receipt by the station, then becomes a part of the routine 15 and 45 minutes past the hour broadcast through the valid period.

d. PILOT REPORTS (PIREPS)

All aviators are encouraged to report in-flight weather conditions that will assist other aviators in planning their flights. The reports are especially significant when the aviator encounters hazardous weather or hazardous conditions that have not been forecast.

FRAME 4. Answer. (a. condensation)



FRAME 5

ADVECTION FOG (Heat transfer by the horizontal motion of air)(cooling)

This type of fog is formed when warmer air is transported over colder land or water surfaces. Cooling from below takes place and gradually builds up a fog layer. The cooling rate depends on the wind speed and the difference between the air temperature and the temperature of the surface over which the air travels.

Advection fog may be formed at sea during any season of the year when air moves from above warm water over a colder ocean current, but all fogs are more intense in the winter.

Over continental areas, advection fogs are common in winter months where cold land areas are adjacent to warmer water. Advection fogs are quite common in the Southeastern United States during the winter, when warm, moist air from the Gulf of Mexico moves over the cooler land area.

Advection fogs form when the wind velocity is light and persists with very strong winds. This type of fog can develop to such a great depth that radiation from the sum does not usually cause it to dissipate.

Normally, advection fog is dissipated by a wind shift that brings dryer air, or transports the fog to another region.

Advection fog is caused by warm air flowing over a cooler surface and the cooling of the air to its dew pt temp.

FRAME 11. Continued

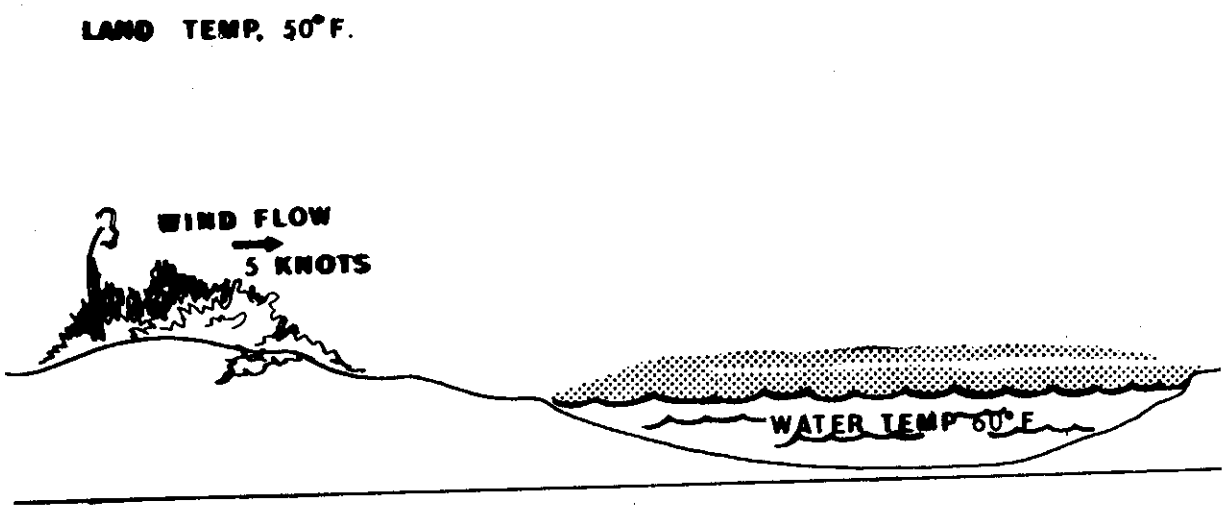
e. NOTICES TO AIRMEN (NOTAMS)

NOTAMS present information about runway conditions, radio or navigation facilities, or other important terminal facilities. NOTAMS may be in the remarks section of the sequence report or may be transmitted separately. Most important is that Flight Service Stations and other controlling agencies will broadcast this information upon request or when they consider it necessary in the interest of safety.

SIGMETS are in-flight advisories of a severe nature and flash broadcasted with a report every 15 minutes. This report is of concern to all aircraft.

AIRMETS are of a moderate severity and concerns aircraft with a weight of 12,500 pounds and under. This broadcast is flashed out and rebroadcast every 30 minutes.

FRAME 5. Answer (warm air, cold, dewpoint temperature)



FRAME 6

STEAM FOG (Evaporation fog)

Steam fog forms when cold, stable air flows over a water surface which is several degrees warmer than the air. The intense evaporation of moisture into the cold air saturates the air and produces fog.

Conditions favorable for steam fog are common over lakes and rivers in the fall and over the ocean in the winter when an offshore wind is blowing.

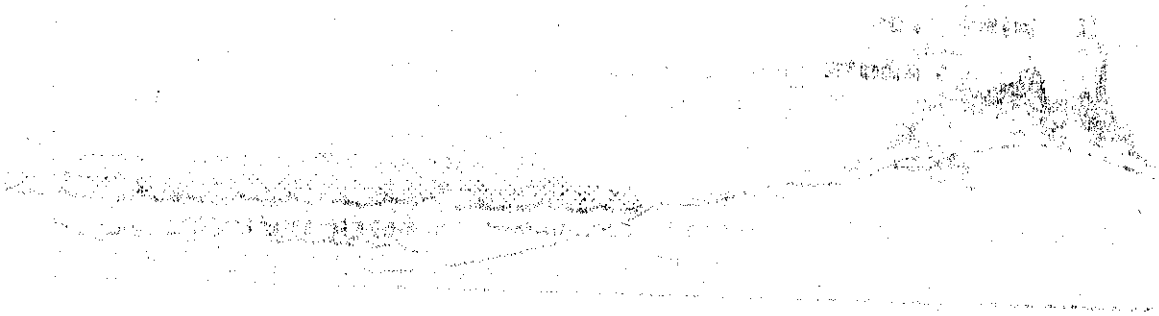
Steam fog is sometimes called "sea smoke". Why?

a. Because of the smoky appearance as it rises from the surface of the water.

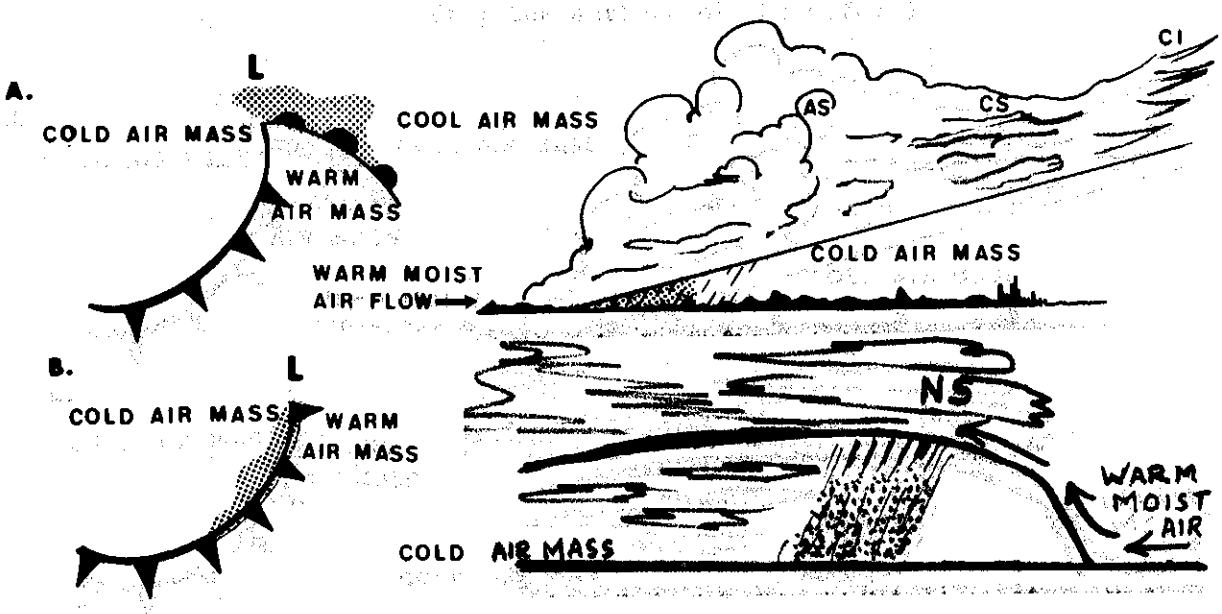
b. Because of its smokey appearance as it descends from the cold air above.

FRAME 11 Answers. SIGMETS are repeated 15 minutes, and are of concern to all aircraft.

AIRMETS concern aircraft with a weight of 12,500 pounds or less. They are re-broadcast every 30 minutes (included in the 15 and 45 minute past the hour broadcast).



FRAME 6. Answer (a. Because of the smoky appearance as it rises from the surface of the water.)



A. WARM FRONTAL FOG (Upper diagram) PREFRONTAL FOG
B. SLOW MOVING COLD FRONT (Lower diagram) POSTFRONTAL FOG

FRAME 7 FRONTAL FOGS (Evaporation formed fog)

Frontal fog is normally associated with slow-moving winter frontal systems. Frontal fog forms when liquid precipitation, falling from the warm moist air above the frontal surface, evaporates in the polar air below the frontal surface. (See diagram above.)

When fog forms immediately ahead of the warm front, it is called prefrontal fog. (See diagram A above.)

When fog forms immediately behind a slow-moving cold front it is called postfrontal fog. (See diagram B above.)

Evaporation from the falling drops may add sufficient water vapor to the cold air to raise the dew point temperature to the temperature of the air. The cold air will then be saturated, and frontal fog will form.

Frontal fog is common with active warm fronts during all seasons. It occurs ahead of the surface front for a distance of approximately 100 miles, and is frequently mixed with intermittent rain or drizzle.

Frontal fogs are formed from the same process as:

a. ground fog.
b. ice fog
c. steam fog.
d. advection fog.

IN-FLIGHT BROADCASTS

TYPE	CONTENT	TIME
SIGMETS	Hazards of severe nature. e.g. Tornadoes	Flash, then every 15 minutes e.g. 15, 30, 45 past the hour.
AIRMETS	Hazards of moderate nature to light aircraft (12,500 lbs or less)	Flash, then included in scheduled weather broadcast 15 & 45 past the hour.
PIREPS	Any weather experienced by a pilot e.g. from cloud tops to turbulence [anything not forecast]	Included in scheduled weather broadcasts - could become a Sigmet or Airmet.
SCHEDULED WEATHER BROADCASTS	Any weather from stations within 150 miles. - - - - - - Major air terminals within 400 miles.	15 min. past the hour. - - - - - - 45 min. past the hour.
NOTAMS	Importance to aircraft in an area. e.g. Runway conditions, inoperative navigation facilities, etc.	In the interest of safety - can be broadcast any time or included in scheduled wx broadcast.

FRAME 7. Answer. c. (steam fog)

FRAME 8 INTRODUCTION

For a review of the material presented so far, take the following short quiz. After you have finished, check your answers on page 2 before continuing.

1. Radiation, advection, and upslope fog are formed by:

   a. saturation.
   b. evaporation.
   c. cooling.

2. Prefrontal, postfrontal, and steam fogs are formed by:

   a. evaporation.
   b. cooling.
   c. fusion.

3. In heavy industrial areas fog can form with as much as 4 degrees spread in the temperature and dew point. This is caused from:

   a. industrial areas are near large bodies of water.
   b. air is lifted more and heated by buildings.
   c. industrial areas generally have an over abundance of condensation nuclei.

4. In most areas of the world, fog occurs more frequently during the _____ half of the year.

   a. colder
   b. warmer

5. Advection fog is more persistent (harder to dissipate) than other types of fog. This condition is caused from:

   a. a continuous in-flow of warm moist air causing fog.
   b. the wind becoming calm and causing the fog to be more dense.

6. Upslope fog would be found on the ____ ward side of the mountain.

   a. lee
   b. wind.

INFORMATION FRAME 12

All of the types of fog covered thus far in the text will probably be encountered by an Army aviator flying normal missions. There are other types of fog with which you must be familiar when flying in specific geographical areas. Some of these are valley fog, industrial fog (smog), and ice fog.

1. Valley fog is formed by cooling of the air during the evening hours, as cold, dense air drains from higher elevations to lower elevations or valleys. As this air collects in the valleys, the air is cooled to its dew point and a dense fog is formed. It is important to remember that air draining into a low area early in the morning is cooler than air that has previously drained into the area, and that the air in the valley is cooled by the cooler air flowing from above.

2. Industrial fog (smog) occurs in industrial areas where there are large amounts of condensation nuclei in the form of smoke particles and sulpher compounds. In these areas where such condensation nuclei are very pronounced, fog can occur with as much as four degrees spread between the temperature-dew point.

3. Ice fog is formed similarly to other types of fog, except that instead of the water vapor condensing when pre-conditions of fog are present, the water vapor undergoes a process called sublimation. Sublimation involves the direct formation of the water vapor into ice crystals below freezing temperatures. These ice crystals are suspended in the air forming a fog layer just as water droplets are suspended in other types of fog. Occuring mostly in artic regions, ice fog forms primarily as a result of human activities occuring locally over settlements and airfields where hydrocarbon fuels are burned. It forms very rapidly from the exhaust gases of aircraft, and where there is little or no wind several helicopters can obscure the runway or a portion of an airfield by simply landing or taking off. Depending on atmospheric conditions, ice fog may persist for periods of a few minutes to several days.

TURN TO PAGE 18 FOR THE
SELF EVALUATION EXERCISE

FRAME 8 Continued

7. One of the dangers of a warm front in winter time is fog. This fog can cover a distance as far as 100 miles ahead of the surface front and is called prefrontal frontal fog.

   a. 50/postfrontal
   b. 100/ postfrontal
   c. 75/advection
   d. 100/prefrontal

8. When cold, stable air flows over a water surface which is several degrees warmer than the air, fog will form over the water and it is called:

   a. ice fog.
   b. steam fog.
   c. advection fog.

TURN BACK TO PAGE 2 FOR
THE ANSWERS

SELF EVALUATION EXERCISE

1. High humidity and light wind are two main factors that are necessary for the formation of radiation (ground) fog. Select the third main factor.

   a. Clear night
   b. Cloudy night
   c. Dark night
   d. Winter night

2. Which of the following temperatures and dew point spread indicates the possibility of fog forming?

   a. MWL 200E350100015+ 291/71/51/1604/004
   b. SPS S M1003R- 204/69/68/1805/998
   c. ABI 015+ 152/110/45/2515/003
   d. FTW 250M500015 190/90/70/2110/005

3. The wind usually associated with the formation of radiation (ground) fog is:

   a. about 10 to 15 knots.
   b. about 3 to 5 knots.
   c. 20 to 25 knots.
   d. no wind.

4. Radiation (ground) fog usually forms:

   a. after sunup.
   b. 1 to 3 hours before sunup.
   c. before midnight.
   d. 1 to 3 hours after sunup.

5. Upslope fog is formed by the process of:

   a. adiabatic cooling.
   b. compression.
   c. subsidence.
   d. convergence.

6. For the formation of upslope fog the relative humidity must be high and the wind strong enough to lift air to a cooler altitude where it becomes saturated. What other factor is necessary in the formation of upslope fog?

   a. Stable air.
   b. Unstable air.
   c. Conpensation.
   d. Delineation.

7. Radiation (ground) fog will usually dissipate:

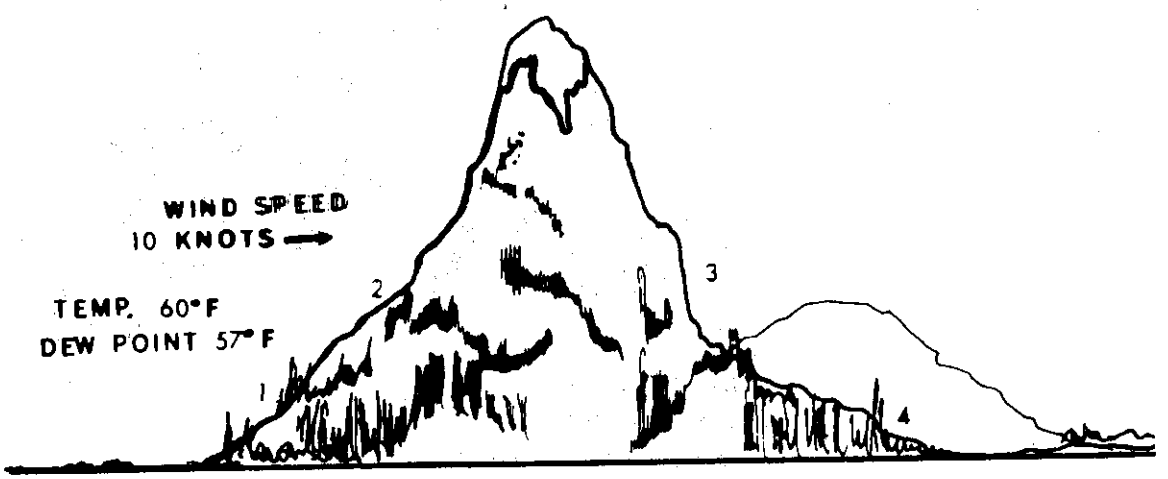
a. before sunup.
(b). 1 to 3 hours after sunup.
c. 3 to 5 hours before sunup.
d. before midnight.

8. At what wind speed will radiation (ground) fog normally start dissipating?

a. 3 to 5 knots.
(b) 7 to 10 knots.
c. 10 to 30 knots.
d. 35 to 55 knots.

9. In the dissipation of all kinds of fog, which factors are the most important?

(a) Wind and temperature
b. Condensation and precipitation
c. Sublimation and temperature
d. Wind and condensation



10. In the above diagram, where would you expect fog to form and what type of fog?

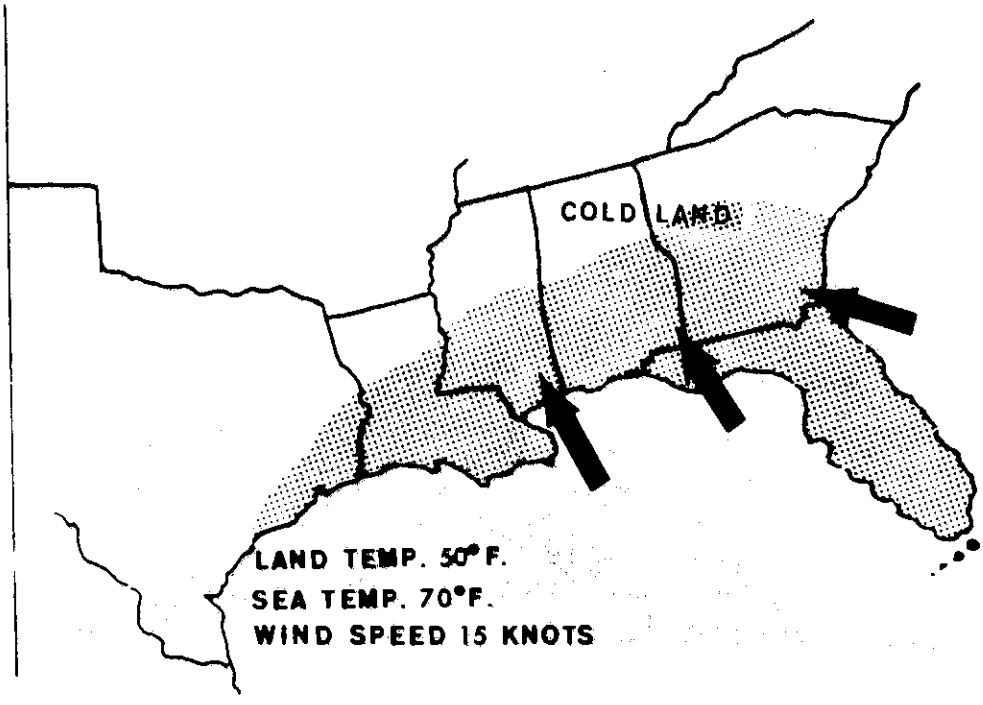
a. Position 1, valley fog.
(b) Position 2, upslope fog.
c. Position 3, advection fog.
d. Position 4, upslope fog.

11. Ground fog is reported at your destination 80 NM away. It is a bright, clear morning. The 0800 local report from your destination shows the wind has picked up to 15 knots. You plan to leave at 0840 lacal for your destination. You should:

a. plan the flight for another day.
b. select an alternate and proceed to your destination as the fog will clear before your arrival.
c. leave eariler and go to your alternate airport.
d. delay your flight until the afternoon, in order to allow plenty of time for the sun to burn the fog out.

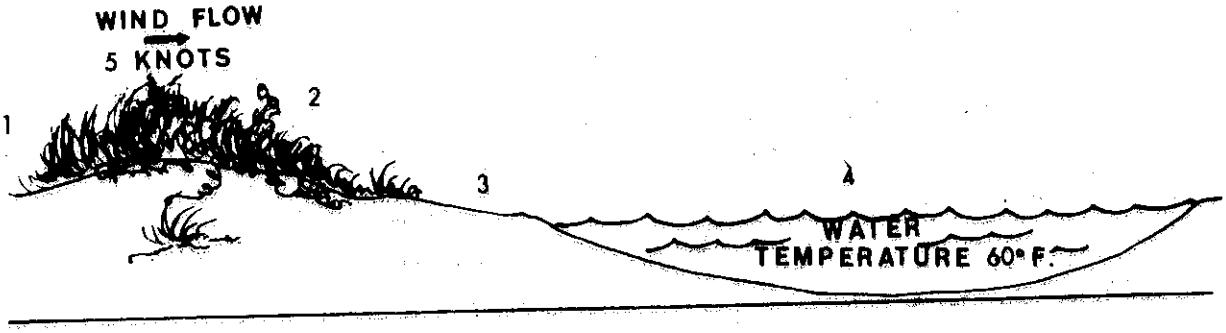
12. A weather report was flashed out on navigational facilities and then was rebroadcast at 15 and 45 past the hour; reporting moderate turbulance and icing. This report would be a:

a. PIREPS.
b. SCHEDULED WEATHER BROADCAST.
c. SIGMET.
d. AIRMET.



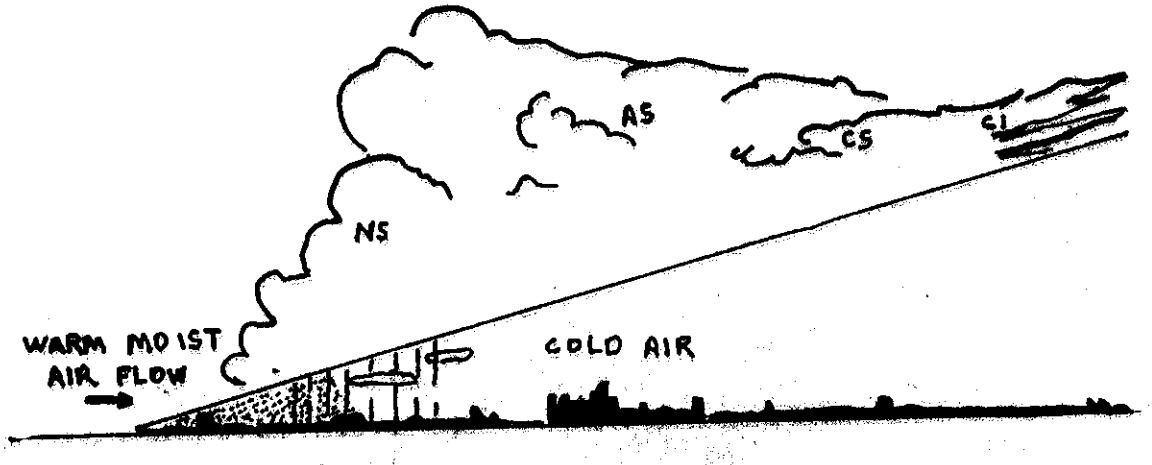
13. In the above diagram, the fog that covers a wide area in the southeastern United States during the winter months is called:

a. radiation fog.
b. upslope fog.
c. advection fog.
d. steam fog.



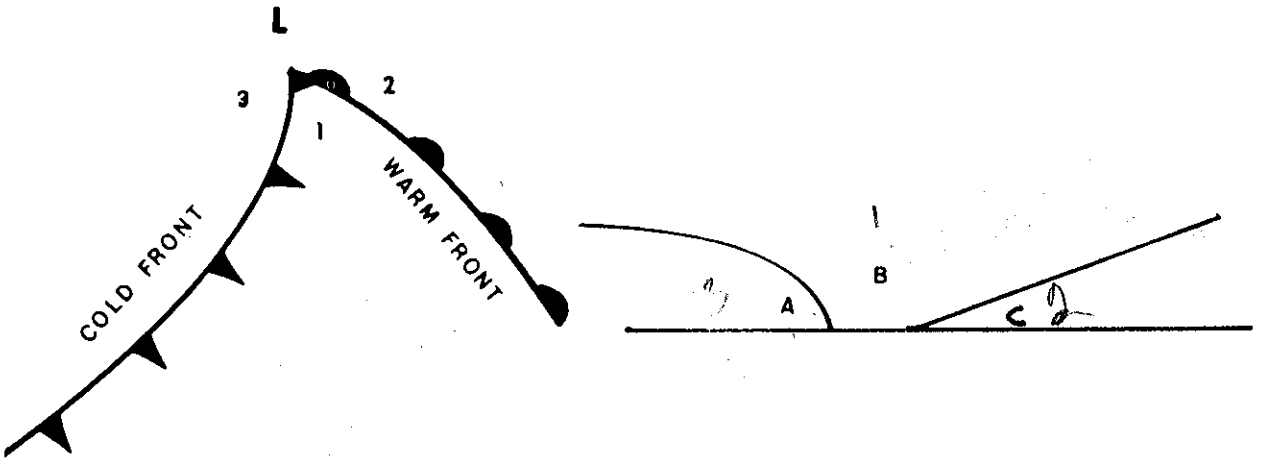
14. In the above diagram select the number over the area where fog might form and select the type of fog.

a. Number 1/frontal fog.
b. Number 2/radiation fog.
c. Number 3/steam fog.
d. Number 4/steam fog.



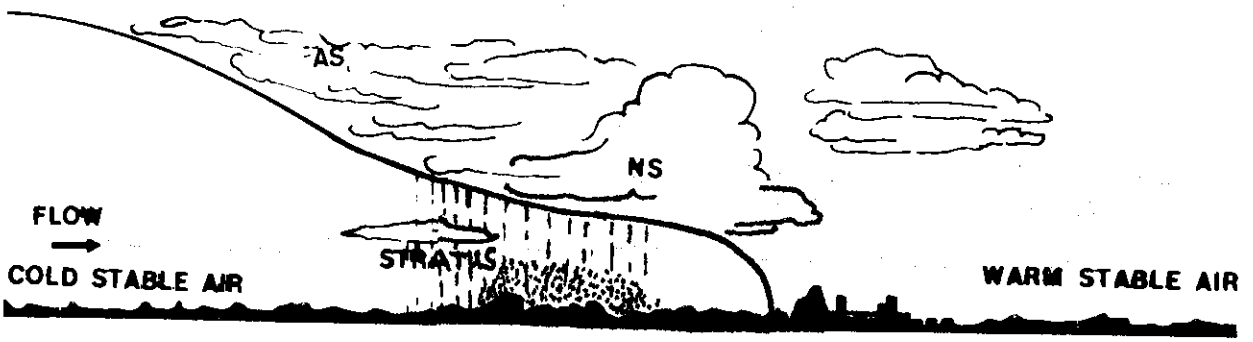
15. Referring to the diagram above, what causes this fog and what is it called?

a. Contact cooling/advection.
b. Contact cooling/radiation.
c. Evaporation/postfrontal.
d. Evaporation/prefrontal.



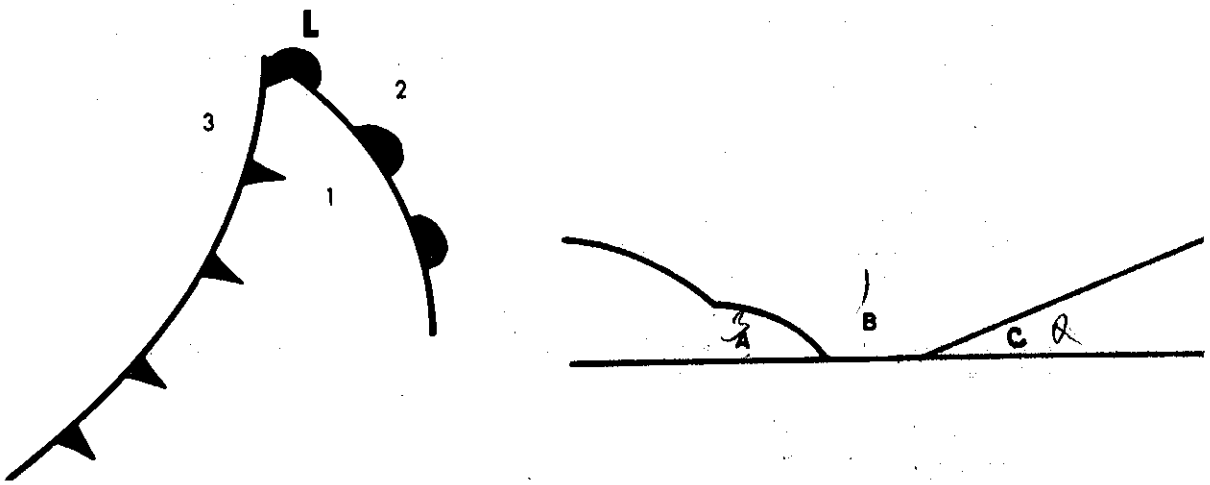
16. In the diagram above select the number and letter where prefrontal fog would most likely form.

a. 3 and A
b. 1 and B
c. 2 and C
d. 1 and C



17. Referring to the diagram above, select the name of the fog and the factor that caused this fog.

a. Ice fog/sublimation
b. Postfrontal fog/evaporation
c. Prefrontal fog/evaporation
d. Advection/contact cooling



18. From the diagram above select the number and letter where post-frontal fog would likely form.

a. 3 and A
b. 1 and B
c. 1 and A
d. 2 and C

19. The only weather aid or aids that you can monitor in flight over navigational facilities that have voice capabilities are:

a. scheduled weather broadcasts at 15 and 45 past the hour.
b. AIRMETS, SIGMETS, and PIREPS.
c. NOTAMS.
d. all of the above.

20. If you overheard a SIGMET report broadcast for your area and you were flying an OH-13; this report would:

a. not concern you as it is just for heavy aircraft.
b. concern you as it is an advisory just for light aircraft.
c. concern all aircraft flying the general area.
d. indicate a scheduled weather broadcast.

21. While flying VFR enroute to your destination you receive a flash report that the weather is deteriorating; the visibility is now 1 3/4 miles, and the ceiling is 900 feet. You heard this report broadcast again at 15 and 45 minutes past the hour. This would be what type of a report?

a. PIREPS
b. SIGMETS
c. NOTAM
d. AIRMET

22. If you are just within 400 miles of a large air terminal which is your destination, and you wanted to receive the scheduled weather broadcast for that terminal, at what time would you listen for that report?

a. On the hour.
b. At 15 minutes past the hour.
c. At 30 minutes past the hour.
d. At 45 minutes past the hour.

23. When a pilot reports a weather phenomena encountered enroute, it is labeled as:

a. AIRMETS.
b. PIREPS.
c. SIGMETS.
d. NOTAMS.

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ANSWERS TO SELF EVALUATION EXERCISE

1. a
2. b
3. b
4. b
5. a
6. a
7. b
8. b
9. a
10. b
11. b
12. d
13. c
14. d
15. d
16. c
17. b
18. a
19. d
20. c
21. d
22. d
23. b

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