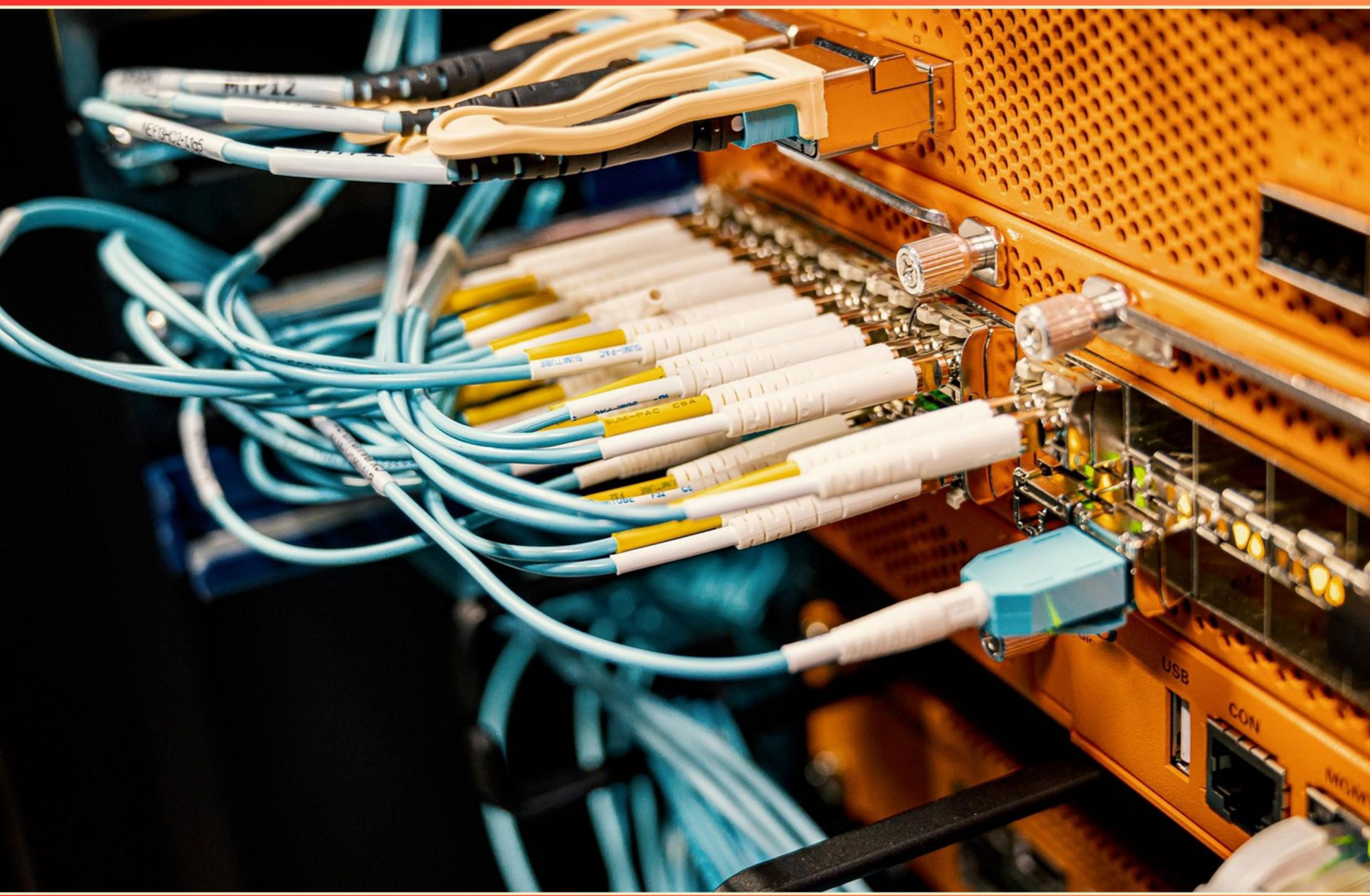
ATT FIELD COMPETENCY (FC) PRACTICE TEST (SAMPLE)

STUDY GUIDE



SAMPLE STUDY GUIDE WITH LIMITED QUESTIONS

VISIT US ONLINE FOR THE FULL VERSION STUDY GUIDE

https://attfc.examzify.com

Copyright © 2026 by Examzify - A Kaluba Technologies Inc. product.

ALL RIGHTS RESERVED.

No part of this book may be reproduced or transferred in any form or by any means, graphic, electronic, or mechanical, including photocopying, recording, web distribution, taping, or by any information storage retrieval system, without the written permission of the author.

Notice: Examzify makes every reasonable effort to obtain accurate, complete, and timely information about this product from reliable sources.

SAMPLE

Table of Contents

Copyright 1

Table of Contents 2

Introduction 3

How to Use This Guide 4

Questions 5

Answers 8

Explanations 10

Next Steps 15

SAMPLE

Introduction

Preparing for a certification exam can feel overwhelming, but with the right tools, it becomes an opportunity to build confidence, sharpen your skills, and move one step closer to your goals. At Examzify, we believe that effective exam preparation isn't just about memorization, it's about understanding the material, identifying knowledge gaps, and building the test-taking strategies that lead to success.

This guide was designed to help you do exactly that.

Whether you're preparing for a licensing exam, professional certification, or entry-level qualification, this book offers structured practice to reinforce key concepts. You'll find a wide range of multiple-choice questions, each followed by clear explanations to help you understand not just the right answer, but why it's correct.

The content in this guide is based on real-world exam objectives and aligned with the types of questions and topics commonly found on official tests. It's ideal for learners who want to:

- Practice answering questions under realistic conditions,
- Improve accuracy and speed,
- Review explanations to strengthen weak areas, and
- Approach the exam with greater confidence.

We recommend using this book not as a stand-alone study tool, but alongside other resources like flashcards, textbooks, or hands-on training. For best results, we recommend working through each question, reflecting on the explanation provided, and revisiting the topics that challenge you most.

Remember: successful test preparation isn't about getting every question right the first time, it's about learning from your mistakes and improving over time. Stay focused, trust the process, and know that every page you turn brings you closer to success.

Let's begin.

SAMPLE

How to Use This Guide

This guide is designed to help you study more effectively and approach your exam with confidence. Whether you're reviewing for the first time or doing a final refresh, here's how to get the most out of your Examzify study guide:

1. Start with a Diagnostic Review

Skim through the questions to get a sense of what you know and what you need to focus on. Your goal is to identify knowledge gaps early.

2. Study in Short, Focused Sessions

Break your study time into manageable blocks (e.g. 30 – 45 minutes). Review a handful of questions, reflect on the explanations.

3. Learn from the Explanations

After answering a question, always read the explanation, even if you got it right. It reinforces key points, corrects misunderstandings, and teaches subtle distinctions between similar answers.

4. Track Your Progress

Use bookmarks or notes (if reading digitally) to mark difficult questions. Revisit these regularly and track improvements over time.

5. Simulate the Real Exam

Once you're comfortable, try taking a full set of questions without pausing. Set a timer and simulate test-day conditions to build confidence and time management skills.

6. Repeat and Review

Don't just study once, repetition builds retention. Re-attempt questions after a few days and revisit explanations to reinforce learning. Pair this guide with other Examzify tools like flashcards, and digital practice tests to strengthen your preparation across formats.

There's no single right way to study, but consistent, thoughtful effort always wins. Use this guide flexibly, adapt the tips above to fit your pace and learning style. You've got this!

SAMPLE

Questions

SAMPLE

1. What does the term voltage drop refer to?

A. Voltage increase in an electrical device

B. Difference in voltage across an electrical device with current

C. Total voltage in a circuit

D. Voltage measurement at the source

2. What does the letter "D" stand for in a basic schematic diagram?

A. Diode

B. Decoder

C. Display

D. Discriminator

3. What is involved in the installation of a microwave backhaul?

A. Mounting switches and routers

B. Aligning antennas, configuring settings, and ensuring link integrity

C. Installing fiber optic cables only

D. Setting up a wireless access point

4. What are the recommended ways to prevent electrical shock?

A. Use rubber gloves and footwear

B. Isolate, insulate, and ground

C. Set up circuit breakers and fuses

D. Keep electric appliances away from water

5. Which of the following factors does NOT determine the amount of inductance?

A. Number of turns of wire

B. Cross-sectional area of core

C. Distance between windings

D. Current passing through the wire

6. Why is link integrity important in microwave backhaul installations?

A. It ensures proper network speed

B. It prevents data loss during transmission

C. It is needed for physical security

D. It determines user access levels

SAMPLE

7. What is the main purpose of using fiber cleavers in fiber optics?

A. To enhance signal transmission

B. To prepare fiber ends for splicing

C. To test light intensity

D. To connect different fiber types

8. What aspect of VoIP calls can be negatively affected by high latency?

A. Connection duration

B. Sound quality

C. Contact list availability

D. Service update frequency

9. What is an arc burn?

A. A burn from electrical current flowing through tissue or bones

B. A burn from contact with hot surfaces

C. A burn caused by chemical exposure

D. A burn resulting from a fire

10. Define 'network latency'.

A. Time taken for data to travel from source to destination

B. Speed of data transfer across a network

C. Amount of data loss over a connection

D. Rate of data packet sending and receiving

SAMPLE

Answers

SAMPLE

1. B
2. A
3. B
4. B
5. D
6. B
7. B
8. B
9. A
10. A

SAMPLE

Explanations

SAMPLE

1. What does the term voltage drop refer to?

A. Voltage increase in an electrical device

B. Difference in voltage across an electrical device with current

C. Total voltage in a circuit

D. Voltage measurement at the source

The term "voltage drop" specifically refers to the difference in voltage across an electrical device when current is flowing through it. This phenomenon occurs due to the resistance within the device, which causes the voltage to decrease as it passes through. When current flows through a resistor or any other electrical component, some energy is dissipated as heat, resulting in a lower voltage on the output side compared to the input side. The concept is crucial in understanding how electrical circuits function, as it impacts the efficiency of power delivery and the performance of devices. Recognizing the voltage drop helps in designing circuits effectively to ensure that devices receive the appropriate voltage levels for their operation.

2. What does the letter "D" stand for in a basic schematic diagram?

A. Diode

B. Decoder

C. Display

D. Discriminator

In a basic schematic diagram, the letter "D" typically represents a diode. Diodes are semiconductor devices that allow current to flow in one direction while blocking it in the opposite direction. This characteristic is crucial for various electronic applications, such as rectification, signal modulation, and voltage regulation. Recognizing the symbol for a diode in schematic representations is fundamental for understanding circuit functionality, as diodes play a vital role in controlling and directing electrical flow. This knowledge is essential for anyone studying or working in electronics and circuit design, as it helps in the construction and analysis of circuits.

3. What is involved in the installation of a microwave backhaul?

A. Mounting switches and routers

B. Aligning antennas, configuring settings, and ensuring link integrity

C. Installing fiber optic cables only

D. Setting up a wireless access point

The installation of a microwave backhaul primarily involves the process of aligning antennas, configuring settings, and ensuring link integrity. In microwave backhaul systems, the antennas must be precisely aligned to maximize signal strength and minimize interference. Proper configuration of the system settings is necessary to ensure that the microwave links operate optimally and achieve the desired performance. Ensuring link integrity is crucial for maintaining a stable connection, which includes monitoring the signal quality and making adjustments as needed. This process is distinctive to microwave backhaul installations, as it emphasizes the importance of using specialized equipment and techniques that are specific to wireless communication protocols, rather than simply connecting cables or setting up basic networking devices like switches or wireless access points.

SAMPLE

4. What are the recommended ways to prevent electrical shock?

A. Use rubber gloves and footwear

B. Isolate, insulate, and ground

C. Set up circuit breakers and fuses

D. Keep electric appliances away from water

The recommended ways to prevent electrical shock include isolating, insulating, and grounding electrical systems and equipment. Isolation refers to keeping electrical circuits or devices separated from access by people, which helps to minimize the risk of accidental contact. Insulation involves covering conductive materials with non-conductive materials to prevent electrical current from escaping or being accessed. Grounding provides a safe path for electrical current to flow back to the ground in the case of a fault, thereby reducing the risk of shock. Together, these methods work to ensure that individuals are protected from inadvertent exposure to live electrical currents, thereby drastically lowering the chance of electrical shock. Other methods, such as using rubber gloves and footwear, setting up circuit breakers and fuses, and keeping appliances away from water, are also important precautions, but they are secondary to the fundamental principles of isolation, insulation, and grounding which are vital for ensuring electrical safety in a broader sense.

5. Which of the following factors does NOT determine the amount of inductance?

A. Number of turns of wire

B. Cross-sectional area of core

C. Distance between windings

D. Current passing through the wire

Inductance is fundamentally influenced by the physical and geometrical characteristics of the inductor, namely the number of turns of wire, the cross-sectional area of the core, and the distance between the windings. The current passing through the wire does not determine the amount of inductance itself. Instead, it affects the behavior of the inductor in terms of the magnetic field generated and resulting voltage (according to Lenz's Law). While an increase in current can impact the energy stored in the inductor and the inductive reactance in a circuit, the inductance value derived from a particular inductor design remains constant for a given physical configuration. Thus, the factors that directly contribute to the value of inductance are intrinsic to the inductor's physical attributes, rather than the operational parameters such as current.

6. Why is link integrity important in microwave backhaul installations?

A. It ensures proper network speed

B. It prevents data loss during transmission

C. It is needed for physical security

D. It determines user access levels

Link integrity is crucial in microwave backhaul installations primarily because it prevents data loss during transmission. In microwave communication, the integrity of the link directly affects the quality and reliability of the data being transmitted. If the link is compromised due to interference, physical obstructions, or other factors, packets of data can be lost or corrupted, leading to incomplete or incorrect information reaching its destination. Ensuring link integrity means that the communication channels remain stable and effective, maintaining a steady flow of information without loss, which is vital for the performance of any communication network. The other options address different aspects of network performance or security but do not directly relate to the core issue of data transmission integrity. While network speed is important, it is not the primary focus of link integrity. Physical security and user access levels pertain to different areas of network management and security, rather than the integrity of data transmissions themselves.

EXAMPLE

7. What is the main purpose of using fiber cleavers in fiber optics?

A. To enhance signal transmission

B. To prepare fiber ends for splicing

C. To test light intensity

D. To connect different fiber types

The primary purpose of using fiber cleavers in fiber optics is to prepare fiber ends for splicing. Cleaving involves cutting the optical fiber in such a way that the ends are flat and clean, ensuring a precise fit when two fibers are joined together. A well-cleaved fiber end results in minimal loss of light and maximum performance in the splice. This process is critical, as any imperfections at the end of the fiber can lead to increased signal loss and degradation of the optical signal. Although enhancing signal transmission, testing light intensity, or connecting different fiber types are important aspects of fiber optics, they are not the direct functions of a fiber cleaver. The cleaver is specifically designed to ensure that the fiber ends are prepared properly so that when they are spliced, they maintain the integrity of the light signal being transmitted.

8. What aspect of VoIP calls can be negatively affected by high latency?

A. Connection duration

B. Sound quality

C. Contact list availability

D. Service update frequency

High latency in VoIP (Voice over Internet Protocol) calls can significantly degrade sound quality. Latency refers to the time it takes for data packets to travel across the network from the sender to the receiver. When latency is high, there can be noticeable delays in the transmission of voice signals. This delay can lead to overlapping conversations and difficulties in maintaining a natural flow of dialogue, as speakers may inadvertently talk over each other because of the lag. Additionally, high latency can cause echoes, distortions, and interruptions in audio, impacting the overall clarity and intelligibility of the conversation. These factors directly contribute to a poor user experience, making sound quality a critical aspect of VoIP performance affected by latency.

9. What is an arc burn?

A. A burn from electrical current flowing through tissue or bones

B. A burn from contact with hot surfaces

C. A burn caused by chemical exposure

D. A burn resulting from a fire

An arc burn specifically refers to a type of burn caused by an electrical arc, which occurs when an electrical current flows through the air from one conductor to another. This can happen when there's a gap in the circuit, often resulting in a flash of electricity that generates extreme heat. The intense heat from the arc can cause significant tissue damage and burns, typically appearing as superficial or deep burns on the skin and can also affect underlying tissues and bones. This answer is accurate because it directly addresses the nature of an arc burn as distinct from other types of burns, which are caused by different sources such as flames, hot surfaces, or chemical reactions. Understanding this distinction is crucial for responding appropriately to electrical injuries in various environments.

SAMPLE

10. Define 'network latency'.

A. Time taken for data to travel from source to destination

B. Speed of data transfer across a network

C. Amount of data loss over a connection

D. Rate of data packet sending and receiving

Network latency refers to the time taken for data to travel from the source to the destination across a network. This encompasses various delays that can occur during this process, including any processing time at routers and switches, queuing delays due to network congestion, and the propagation delay caused by the physical distance between the communicating devices. High latency can result in slower response times and can significantly affect the performance of applications, especially those requiring real-time communication, such as video calls or online gaming. In contrast, the other options focus on different aspects of network performance. The speed of data transfer relates to bandwidth, which indicates how much data can be transmitted in a given time frame, rather than the delay experienced during transmission. The amount of data loss over a connection deals with packet loss, a separate issue that indicates whether all the transmitted data successfully reaches the destination. Lastly, the rate of data packet sending and receiving, while important for determining overall network throughput, does not directly measure the time it takes for a single packet to make the journey from point A to point B, which is the essence of network latency.

SAMPLE

Next Steps

Congratulations on reaching the final section of this guide. You've taken a meaningful step toward passing your certification exam and advancing your career.

As you continue preparing, remember that consistent practice, review, and self-reflection are key to success. Make time to revisit difficult topics, simulate exam conditions, and track your progress along the way.

If you need help, have suggestions, or want to share feedback, we'd love to hear from you. Reach out to our team at hello@examzify.com.

Or visit your dedicated course page for more study tools and resources:

https://attfc.examzify.com

We wish you the very best on your exam journey. You've got this!

SAMPLE