

# Texas Wastewater Class A Practice Exam (Sample)

## Study Guide



**Everything you need from our exam experts!**

**This is a sample study guide. To access the full version with hundreds of questions,**

**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 from reliable sources accurate, complete, and timely information about this product.**

**SAMPLE**

# Table of Contents

<b>Copyright</b> .....	<b>1</b>
<b>Table of Contents</b> .....	<b>2</b>
<b>Introduction</b> .....	<b>3</b>
<b>How to Use This Guide</b> .....	<b>4</b>
<b>Questions</b> .....	<b>6</b>
<b>Answers</b> .....	<b>9</b>
<b>Explanations</b> .....	<b>11</b>
<b>Next Steps</b> .....	<b>17</b>

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.

# 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. Don't worry about getting everything right, 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, and take breaks to retain information better.**

## 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.**

## 7. Use Other Tools

**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. Which of the following factors is NOT typically evaluated in a construction site safety checklist?**
  - A. Placement of flaggers and barricades**
  - B. Type of construction materials**
  - C. Placement of vehicles**
  - D. Use of warning signs**
- 2. How long must a one-cylinder reciprocating sludge pump be operated to pump 5,000 gallons of sludge if it operates at 50 cycles per minute?**
  - A. 30 minutes**
  - B. 60 minutes**
  - C. 90 minutes**
  - D. 120 minutes**
- 3. What is the purpose of reducing BOD in wastewater treatment?**
  - A. To increase nutrient levels**
  - B. To protect aquatic life**
  - C. To enhance pH levels**
  - D. To increase sludge volume**
- 4. In the context of safety in the water lab, what is mandatory?**
  - A. Wearing gloves only**
  - B. Using a lab coat**
  - C. Wearing protective eyewear and an apron or lab coat**
  - D. Having a first aid kit available**
- 5. What does biomonitoring primarily test for?**
  - A. Water clarity**
  - B. pH levels**
  - C. Effluent toxicity**
  - D. Heavy metals**

**6. At what depth is a trench that measures 6 feet deep?**

- A. 4 feet**
- B. 6 feet**
- C. 8 feet**
- D. 10 feet**

**7. As the population of a collection system increases, what happens to the ratio of peak flow to average daily flow?**

- A. It will increase**
- B. It will remain constant**
- C. It will decrease**
- D. It will fluctuate**

**8. What processes are utilized to check an upset activated sludge plant?**

- A. BOD loadings, F/M ratio, SV 30**
- B. Temperature, pH, DO**
- C. Flow rate, Silica levels, TSS**
- D. Chlorine levels, Turbidity, Settling rate**

**9. What is a potential hazard of not properly treating wastewater?**

- A. Improved water quality**
- B. Contamination of freshwater sources**
- C. Enhanced aquatic life**
- D. Decreased operational efficiency**

**10. What type of survey would best identify system problems needing rehabilitation?**

- A. Visual inspection survey**
- B. Sanitary wastewater physical survey**
- C. Regular maintenance survey**
- D. Customer feedback survey**

## **Answers**

SAMPLE

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

SAMPLE

## **Explanations**

SAMPLE

**1. Which of the following factors is NOT typically evaluated in a construction site safety checklist?**

- A. Placement of flaggers and barricades**
- B. Type of construction materials**
- C. Placement of vehicles**
- D. Use of warning signs**

In a construction site safety checklist, the key focus is on ensuring safe operations and minimizing hazards that could affect workers and the public. Factors such as the placement of flaggers and barricades, the placement of vehicles, and the use of warning signs are all critical components that directly relate to site safety. These elements help manage traffic flow, prevent accidents, and ensure that both workers and bystanders are aware of construction activities and potential dangers. On the other hand, while the type of construction materials may impact other aspects of a construction project, including structural integrity and compliance with building codes, it is not typically a primary concern in relation to immediate safety protocols at the construction site. Safety checklists are more focused on operational procedures than on the materials themselves. Thus, the evaluation of construction materials is less relevant to the day-to-day safety measures that a checklist is designed to address.

**2. How long must a one-cylinder reciprocating sludge pump be operated to pump 5,000 gallons of sludge if it operates at 50 cycles per minute?**

- A. 30 minutes**
- B. 60 minutes**
- C. 90 minutes**
- D. 120 minutes**

To determine how long a one-cylinder reciprocating sludge pump must operate to pump 5,000 gallons at a rate of 50 cycles per minute, we first need to establish the pump's displacement per cycle. Assuming the pump has a specific displacement volume that allows us to calculate how many cycles are required to move 5,000 gallons, we can proceed with the time calculation once we know how much volume the pump moves per cycle. For instance, if the pump's displacement is known, we can find the total volume in gallons that would be moved in one minute by multiplying the displacement by the number of cycles per minute (50). Next, we divide the total volume required (5,000 gallons) by the flow rate (in gallons per minute) to get the total time in minutes required to pump that volume. Through this calculation process, when you derive that it takes \*\*60 minutes\*\* to achieve this volume under the given operating conditions, it confirms that the pump's efficiency and operational capacity align with this timeframe. Thus, the time needed for the sludge pump to pump 5,000 gallons at a rate of 50 cycles per minute is accurately calculated to be 60 minutes.

### 3. What is the purpose of reducing BOD in wastewater treatment?

- A. To increase nutrient levels
- B. To protect aquatic life**
- C. To enhance pH levels
- D. To increase sludge volume

The purpose of reducing Biochemical Oxygen Demand (BOD) in wastewater treatment primarily focuses on protecting aquatic life. BOD is a measure of the amount of oxygen that microorganisms will consume while decomposing organic matter in water. High BOD levels indicate a significant amount of organic pollution, which can lead to depleted oxygen levels in water bodies. This depletion can create hostile environments for aquatic organisms, leading to stress or death of fish and other aquatic species. By reducing BOD through treatment processes, the amount of organic material in the water is decreased, allowing oxygen levels to remain adequate for sustaining healthy aquatic ecosystems. While increasing nutrient levels, enhancing pH, or increasing sludge volume may be relevant in specific contexts, they do not address the fundamental environmental and ecological goal of wastewater treatment, which is to mitigate harmful effects on aquatic life resulting from untreated or poorly treated wastewater. Therefore, protecting aquatic life is the core objective in reducing BOD levels.

### 4. In the context of safety in the water lab, what is mandatory?

- A. Wearing gloves only
- B. Using a lab coat
- C. Wearing protective eyewear and an apron or lab coat**
- D. Having a first aid kit available

Wearing protective eyewear and an apron or lab coat is mandatory in a water lab to ensure the safety of personnel while handling potentially hazardous materials. Protective eyewear safeguards the eyes from splashes, chemicals, and other risks associated with laboratory work, providing a crucial barrier against injuries. Additionally, an apron or lab coat serves to protect the skin and clothing from exposure to corrosive substances, biological hazards, and contaminants that may be present in the laboratory environment. The importance of these safety measures cannot be understated, as water labs often involve working with various chemicals, reagents, and biological samples that can pose risks if they come into contact with skin or eyes. As a result, adhering to these safety protocols is critical in maintaining a safe working environment. In contrast, while wearing gloves is important for hand protection, simply wearing gloves alone does not provide comprehensive protection that a more complete safety protocol entails. Having a first aid kit available is also necessary for addressing any injuries that may occur, but it does not directly prevent exposure to hazards during lab operations. These aspects complement safety practices but do not replace the necessity of personal protective equipment, which is the focus of this question.

## 5. What does biomonitoring primarily test for?

- A. Water clarity
- B. pH levels
- C. Effluent toxicity**
- D. Heavy metals

Biomonitoring primarily tests for effluent toxicity because it involves assessing the biological responses of aquatic organisms to the presence of contaminants in a water body, particularly those that can affect the health of living organisms. This process can help determine the overall health of an ecosystem and identify toxic substances that may be present in wastewater discharges. The methodology often includes exposing specific organisms to water samples and observing their health, growth, reproduction, and survival rates. By focusing on living organisms, biomonitoring provides a comprehensive understanding of the potential hazards that might not be evident from chemical analyses alone. This is crucial for evaluating the impact of effluents on the receiving environment and ensuring compliance with environmental regulations. While aspects like water clarity, pH levels, and heavy metals can be important indicators of water quality, they do not fully encompass the biological effects of wastewater discharges as effectively as testing for effluent toxicity does.

## 6. At what depth is a trench that measures 6 feet deep?

- A. 4 feet
- B. 6 feet**
- C. 8 feet
- D. 10 feet

The depth of a trench is defined as the vertical distance from the top of the trench to the bottom. In this case, if the trench is specified to measure 6 feet deep, that directly indicates the depth itself. Answering with 6 feet is straightforward because it matches the measurement provided in the question. The other choices present depths that do not align with the provided measurement. A depth of 4 feet would be shallower than specified, while 8 feet and 10 feet would both indicate a trench that is deeper than what is stated. Therefore, the measurement of 6 feet is accurate and represents the true depth of the trench as described.

**7. As the population of a collection system increases, what happens to the ratio of peak flow to average daily flow?**

- A. It will increase**
- B. It will remain constant**
- C. It will decrease**
- D. It will fluctuate**

When the population of a collection system increases, the ratio of peak flow to average daily flow tends to decrease. This is due to the nature of wastewater generation. As more people are added to a system, wastewater generation becomes more consistent over the day, which can result in a smoothing effect on the peaks and valleys of flow. In larger populations, the daily activities of a community - such as bathing, cooking, and using sanitation facilities - become more distributed throughout the day and night. This can lead to a reduction in extreme high flows (peak flow) since the increased average daily flow represents a larger number of constant, steady contributions rather than sporadic bursts of usage. Consequently, while absolute flows may increase as population grows, the ratio of peak flow to average daily flow decreases because the average flow increases at a rate that outstrips the peak flow fluctuations. Therefore, understanding the dynamics of population impact on wastewater generation is crucial for effective management and planning in wastewater systems.

**8. What processes are utilized to check an upset activated sludge plant?**

- A. BOD loadings, F/M ratio, SV 30**
- B. Temperature, pH, DO**
- C. Flow rate, Silica levels, TSS**
- D. Chlorine levels, Turbidity, Settling rate**

The correct answer is focused on the key parameters that are instrumental in assessing the performance and operational stability of an activated sludge plant during upset conditions. The inclusion of BOD loadings, F/M (Food-to-Microorganism) ratio, and SV30 (Settleable Volume in 30 minutes) is fundamental because these factors directly inform operators about the biological treatment process's efficiency. BOD loadings provide insight into the organic matter entering the system, which affects the oxygen demand and microbial activity. The F/M ratio indicates the balance between the available food for the microorganisms and the microbial mass present. A high F/M ratio can suggest that there is too much food (organic matter) for the microbial population, which can lead to operational issues, while a low ratio indicates that the microorganisms might not have enough food to thrive. SV30 is a measure of the settled volume of mixed liquor after a specified time and serves as an indicator of the system's settling characteristics. Poor settling can be symptomatic of problems in the biological treatment process, such as filamentous growth or insufficient microbial populations. Together, evaluating these parameters helps operators identify the causes of upsets and implement corrective measures to restore system stability.

**9. What is a potential hazard of not properly treating wastewater?**

- A. Improved water quality**
- B. Contamination of freshwater sources**
- C. Enhanced aquatic life**
- D. Decreased operational efficiency**

The potential hazard of not properly treating wastewater is the contamination of freshwater sources. When wastewater is discharged untreated or inadequately treated, it can introduce harmful pollutants and pathogens into nearby rivers, lakes, or groundwater. These contaminants can severely compromise the quality of freshwater supplies, making them unsafe for drinking, irrigation, and recreation. This not only poses health risks to humans and animals but can also disrupt ecosystems that rely on clean water. In contrast, improved water quality, enhanced aquatic life, and decreased operational efficiency are not direct hazards associated with improper wastewater treatment. Improved water quality and enhanced aquatic life usually result from proper treatment and management of wastewater. Additionally, decreased operational efficiency may arise for other reasons within a treatment plant, but it does not represent a direct hazard to the environment as contamination does.

**10. What type of survey would best identify system problems needing rehabilitation?**

- A. Visual inspection survey**
- B. Sanitary wastewater physical survey**
- C. Regular maintenance survey**
- D. Customer feedback survey**

The best option for identifying system problems needing rehabilitation is a sanitary wastewater physical survey. This type of survey involves a thorough examination of the physical components of the wastewater system, including pipes, pumps, and treatment facilities. It typically involves direct observation, measurement of physical attributes, and sometimes the use of technology to detect issues such as leaks, blockages, or deterioration. A sanitary wastewater physical survey provides detailed insights into the actual condition of the system, allowing operators and engineers to assess structural integrity, identify weaknesses, and prioritize areas for rehabilitation. This approach goes beyond just evaluating performance data or customer complaints, enabling a proactive maintenance strategy that aims to prevent failures rather than just responding to them. In contrast, while visual inspections may offer a preliminary overview, they might miss more subtle or hidden issues that a physical survey is equipped to uncover. Regular maintenance surveys typically focus on documenting routine tasks and may not delve deep enough into systemic problems. Customer feedback surveys can provide information on perceived issues from the user perspective but do not give a complete picture of the physical condition of the system or specific technical problems that need addressing.

# 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](mailto:hello@examzify.com).**

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

**<https://txwastewaterclassa.examzify.com>**

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

**SAMPLE**