

খ সেট

জুনিয়র স্কুল সার্টিফিকেট পরীক্ষা,

পশ্চিম (সৃজনশীল + বহুনির্বাচনি অঙ্গীকরণ)

বিষয় কোড :

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সময়—৩ ঘণ্টা

পূর্ণমান—৭০+৩০=১০০

সৃজনশীল প্রশ্ন

মান—৭০

দ্রষ্টব্য :—কোন পাশের সংখ্যা প্রশ্নের পূর্ণমান জ্ঞাপক। প্রদত্ত উদ্দীপকগুলো মনোযোগসহকারে পড় এবং সংশ্লিষ্ট প্রশ্নের উত্তর দাও।
ক, খ ও গ বিভাগ থেকে দুইটি করে এবং ঘ বিভাগ থেকে একটিসহ মোট সাতটি প্রশ্নের উত্তর দিতে হবে।

ক বিভাগ—প্রতিপনিত

- | | সংখ্যক |
|--|--------|
| ১। ৭, ১৬, ২৫, ৩৪, ৪৩, | |
| (ক) ২৫ এবং ৩৪-কে দুইটি বর্ণের সমষ্টিরূপে প্রকাশ কর। | ২ |
| (খ) তালিকার ২০তম সংখ্যাটি নির্ণয় কর। | ৪ |
| (গ) তালিকার ১ম ৬০টি সংখ্যার সমষ্টি নির্ণয় কর। | ৪ |
| ২। এক ব্যক্তি বার্ষিক শতকরা ১০ টাকা মূল্যফায় ৬০০০ টাকা ৩ বছরের জন্য ব্যাংকে জমা রাখলেন। | |
| (ক) ১ম বছরান্তে মূল্যফা-আসল নির্ণয় কর। | ২ |
| (খ) সরল মূল্যফা ও চক্রবৃদ্ধি মূল্যফার পার্থক্য নির্ণয় কর। | ৪ |
| (গ) একই হার সরল মূল্যফায় উক্ত আসল কত বছরে মূল্যফা-আসলে দেড়গুণ হবে? | ৪ |
| ৩। একটি ঘরের সৈর্য্য গ্রহের ৪ কণ। প্রতি বর্ণমিটার ১২-৫০ টাকা মরে ঘরটির মেঝে কার্পেট দিয়ে ঢাকতে মোট ৩২০০ টাকা ব্যয় হয়। | |
| (ক) ঘরটির ক্ষেত্রফল নির্ণয় কর। | ২ |
| (খ) ঘরটির সৈর্য্য ও গ্রহ নির্ণয় কর। | ৪ |
| (গ) ঘরটির উচ্চতা ৩ মিটার এবং এর দেওয়ালগুলো ২০ সে. মি. পুরু হলে চার দেওয়ালের আয়তন নির্ণয় কর। | ৪ |

খ বিভাগ—বীজপনিত

- | | |
|---|---|
| ৪। $x^2 - \sqrt{5}x + 1 = 0$ | |
| (ক) $x + \frac{1}{x}$ এর মান নির্ণয় কর। | ২ |
| (খ) প্রমাণ কর যে, $x^3 - \frac{1}{x^3} = 4$ | ৪ |
| (গ) $x^6 - \frac{1}{x^6}$ এর মান নির্ণয় কর। | ৪ |
| ৫। $A = x^2 - 5x + 6$, $B = x^2 - 9$, $C = x^2 + 4x + 3$ | |
| (ক) $\frac{C}{x^2 + x}$ কে লঘিষ্ঠ আকারে প্রকাশ কর। | ২ |
| (খ) সরল কর : $\frac{1}{A} + \frac{1}{B}$ | ৪ |
| (গ) $\frac{1}{A} \cdot \frac{1}{B} \cdot \frac{1}{C}$ কে সাধারণ হরবিশিষ্ট ভগ্নাংশে প্রকাশ কর। | ৪ |
| ৬। কোন ভগ্নাংশের লবের সাথে ৩ যোগ করলে এর মান ১ হয়। আবার হরের সাথে ২ যোগ করলে এর মান $\frac{1}{2}$ হয়। | |
| (ক) ভগ্নাংশটিকে $\frac{x}{y}$ ধরে সমীকরণ জোড় গঠন কর। | ২ |
| (খ) ভগ্নাংশটি নির্ণয় কর। | ৪ |
| (গ) লেখচিত্রের সাহায্যে সমীকরণ জোড়ের সমাধান কর। | ৪ |

[পর পৃষ্ঠা দ্রষ্টব্য]

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Table of Contents Question Out Jsc 2014 Jessor Board

1. Understanding the eBook Question Out Jsc 2014 Jessor Board
 - The Rise of Digital Reading Question Out Jsc 2014 Jessor Board
 - Advantages of eBooks Over Traditional Books
2. Identifying Question Out Jsc 2014 Jessor Board
 - Exploring Different Genres
 - Considering Fiction vs. Non-Fiction
 - Determining Your Reading Goals
3. Choosing the Right eBook Platform
 - Popular eBook Platforms
 - Features to Look for in an Question Out Jsc 2014 Jessor Board
 - User-Friendly Interface
4. Exploring eBook Recommendations from Question Out Jsc 2014 Jessor Board
 - Personalized Recommendations
 - Question Out Jsc 2014 Jessor Board User Reviews and Ratings
 - Question Out Jsc 2014 Jessor Board and Bestseller Lists

5. Accessing Question Out Jsc 2014 Jessor Board Free and Paid eBooks
 - Question Out Jsc 2014 Jessor Board Public Domain eBooks
 - Question Out Jsc 2014 Jessor Board eBook Subscription Services
 - Question Out Jsc 2014 Jessor Board Budget-Friendly Options
6. Navigating Question Out Jsc 2014 Jessor Board eBook Formats
 - ePub, PDF, MOBI, and More
 - Question Out Jsc 2014 Jessor Board Compatibility with Devices
 - Question Out Jsc 2014 Jessor Board Enhanced eBook Features
7. Enhancing Your Reading Experience
 - Adjustable Fonts and Text Sizes of Question Out Jsc 2014 Jessor Board
 - Highlighting and Note-Taking Question Out Jsc 2014 Jessor Board
 - Interactive Elements Question Out Jsc 2014 Jessor Board
8. Staying Engaged with Question Out Jsc 2014 Jessor Board
 - Joining Online Reading Communities
 - Participating in Virtual Book Clubs
 - Following Authors and Publishers Question Out Jsc 2014 Jessor Board
9. Balancing eBooks and Physical Books Question Out Jsc 2014 Jessor Board
 - Benefits of a Digital Library
 - Creating a Diverse Reading Collection Question Out Jsc 2014 Jessor Board
10. Overcoming Reading Challenges
 - Dealing with Digital Eye Strain
 - Minimizing Distractions
 - Managing Screen Time
11. Cultivating a Reading Routine Question Out Jsc 2014 Jessor Board
 - Setting Reading Goals Question Out Jsc 2014 Jessor Board
 - Carving Out Dedicated Reading Time
12. Sourcing Reliable Information of Question Out Jsc 2014 Jessor Board
 - Fact-Checking eBook Content of Question Out Jsc 2014 Jessor Board
 - Distinguishing Credible Sources
13. Promoting Lifelong Learning

- Utilizing eBooks for Skill Development
- Exploring Educational eBooks

14. Embracing eBook Trends

- Integration of Multimedia Elements
- Interactive and Gamified eBooks

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this video accompanies the chm 252 lab nitration of bromobenzene in this video students will get an introduction to the lab as well as the set up for conducting the reaction students should

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for the nitration 4 01 ml of nitric acid 4 00 ml of sulfuric acid and 4 56 ml bromobenzene were used to complete the reaction with these measurements bromobenzene was found to be the limiting reagent since only 4 56 ml of bromobenzene was used the amount of product predicted to be recovered was 8 7533 g

lab 334 nitration of aromatic compounds preparation of studocu - Dec 23 2022

the aim of the experiment is to determine and study electrophilic aromatic substitution reaction eas particularly nitration of methyl benzoate go give methyl m nitrobenzoate thus determine the weight melting point and percentage yield of the pure methyl m nitrobenzoate abstract

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in this experiment we will carry out the nitration of bromobenzene bromine substituted on an aromatic ring is an ortho para directing group it will direct an incoming electrophile to the ortho and para positions it is also deactivating meaning that its reactions will be slower than the identical reactions of benzene

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section 20711 lab experiment nitration of bromobenzene introduction the chemical reaction of nitration consists of a nitro group being added to or substituted in a molecule nitration can basically be carried out by a mixture of concentrated nitric acid and sulfuric acid this mixture is useful to obtain the active nitronium ion

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1 go to the restroom and wash the affected area with lots of soap and water the soap in the lab is not suitable for this purpose 2 return to the lab and apply mineral oil to the affected area 3 the summary to this warning is not to touch any part of your body while performing this experiment if you must leave the lab for any reason 1

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in the nitration of bromobenzene a mixture of sulfuric acid and nitric acid react with one another nitric acid the weaker of the two acids will serve as base to form nitronium ion bromobenzene will attack the nitronium ion by nucleophilic attack

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nitration of bromobenzene lab report improved essays 731 words 3 pages open document essay sample check writing quality show more this experiment was performed in order to demonstrate the principles of nitration through electrophilic aromatic substitution it also examined the effects of bromine on an aromatic ring ortho para vs meso directing

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then actual is your actual findings yield actual theoretical $\times 100$ what are the possible side reactions of nitration of bromobenzene dinitration can occur at ortho para or at both ortho positions occurs in overheating meta product happens very rarely becuase bromine is an ortho para director

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the soap in the lab is not suitable for this purpose 2 return to the lab and apply mineral oil to the affected area theory and explanation of the nitration of bromobenzene if the temperature of the reaction mixture exceeds 60 °C

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the bromine substituent in bromobenzene is an ortho para director the para position is favored due to steric effects in the reaction that takes place in this lab a nitro group is substituted onto bromobenzene at the para position to form 1-bromo-4-nitrobenzene

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study with quizlet and memorize flashcards containing terms like reacting sulfuric and nitric acid together produces the nitronium ion alone nitric acid is not a strong enough electrophile to react with bromobenzene sulfuric acid is added to the nitric acid the reverse rxn can overheat and boil easily includes a claisen adaptor and

nitration of bromobenzene 6 nitration of bromobenzene 10 19 - Oct 01 2023

over 5 minutes slowly pipet this bromobenzene into the icy cold nitration mixture hno₃ h₂so₄ in the 125 ml flask and stir continue to stir the reaction mixture in the ice bath for 30 minutes do not heat in a new 250 ml erlenmeyer

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on the right the arenium cation has a nitro set with incredibly small 0.6 angstrom bond distances this will result in an optimization failure as the atoms are even close for the programme to accommodate their electrons demonstration of creating the p arenium cation by to nitration of bromobenzene

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lab report 15 nitration of bromobenzene brynn abbott amp katie muerer bea0006 uah ch 336 02 september 21 2022 abstract in this experiment the electrophilic aromatic substitution mechanism was used to obtain 4-nitrobromobenzene and 2-nitrobromobenzene recrystallization was used to purify 4-nitrobromobenzene

nitration of bromobenzene the purpose of this lab was to - Jul 30 2023

the purpose of this lab was to observe where substituents are added on a benzene ring by way of electrophilic aromatic substitution the electrophilic source in the nitration of bromobenzene comes from a nitronium ion no₂⁺ which acts as the electrophilic species

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nitration of bromobenzene is an electrophilic aromatic substitution reaction the electrophile will be formed from 4.0 ml of

nitric acid and 4 0ml of sulfuric acid and will then react with 4 5ml of bromobenzene this will produce o bromonitrobenzene and p bromonitrobenzene

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experimental spectra reaction a fluorobenzene stock fluorobenzene 1 h 1 h 19 f 19 f 13 c nmr fid for reference only sample 1 h 1 h 19 f 19 f 13 c nmr eas nitration of fluorobenzene crude product not available for submission for credit

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lab writeup the purpose of this lab was to observe where substituents are added on benzene ring way of electrophilic aromatic substitution the electrophilic

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chem 2261 lab 5 nitration of bromobenzene introduction an electrophilic aromatic substitution reaction is an important process that allows for intermediate chemical structures to be used as precursors to pharmaceuticals and other industrially produced chemicals by adding different functional groups into an aromatic ring

lab report nitration of bromomobenzene ipl org - Feb 22 2023

lab report 10 nitration of bromobenzene raekwon filmore cm 244 section 40 march 27 2018 introduction for this experiment nitration of bromobenzene was the focus of the lab the benzene is an aromatic compound and when it reacts with wither a mixture of sulfuric acid or nitric acid creates what is known as a nitro group