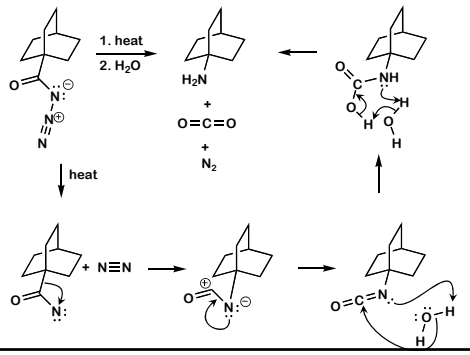
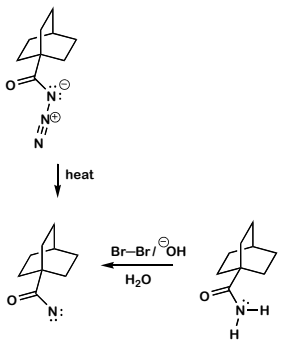
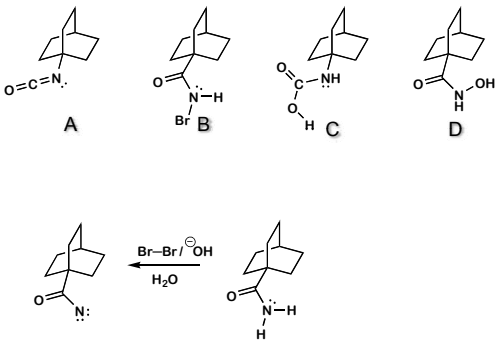
The nitrene is unstable.
Choose its rearrangement product.

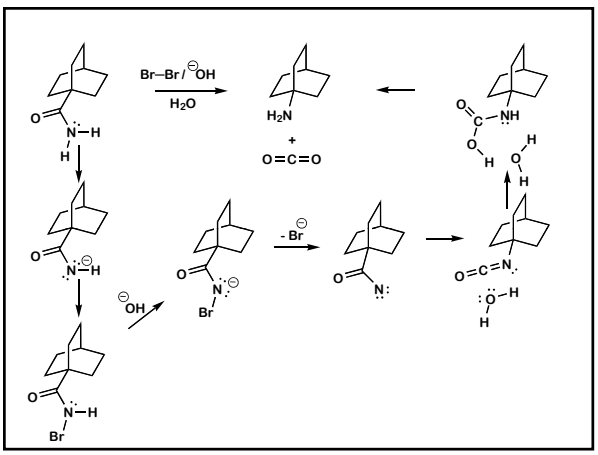


The nitrene is also produced when the amide is treated with Br_2/ $^{\ominus}OH$. What is the mechanism of this reaction?

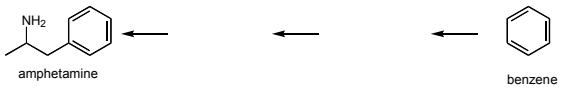


Which of the following would be a reasonable intermediate in the transformation of the amide to the nitrene?

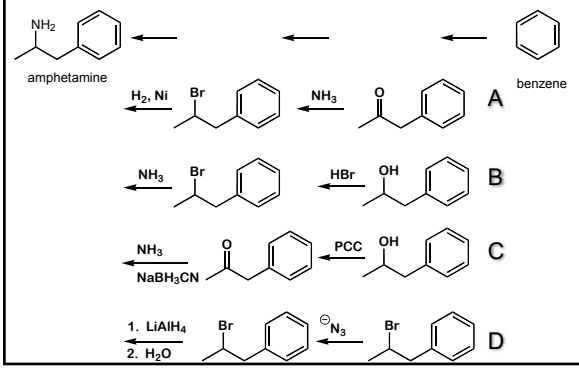




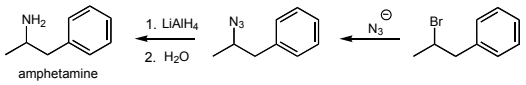
Propose a synthesis of amphetamine from benzene and any other reagents containing four carbon atoms or less.



Choose the last step ***least*** likely to be successful.



How could amphetamine be prepared from benzene and any necessary reagents?



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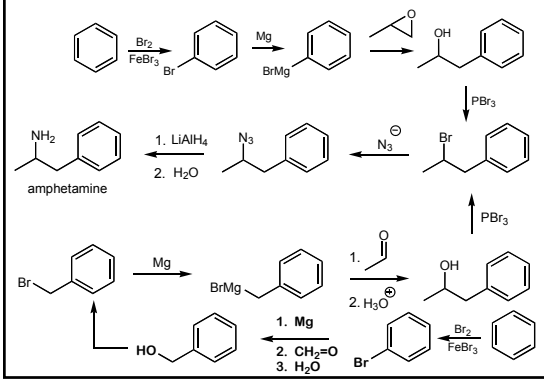
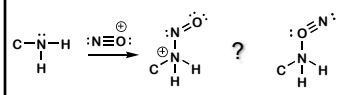
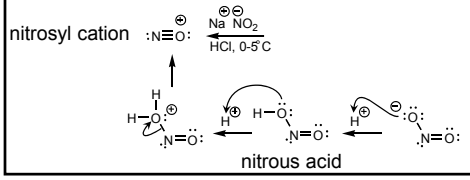


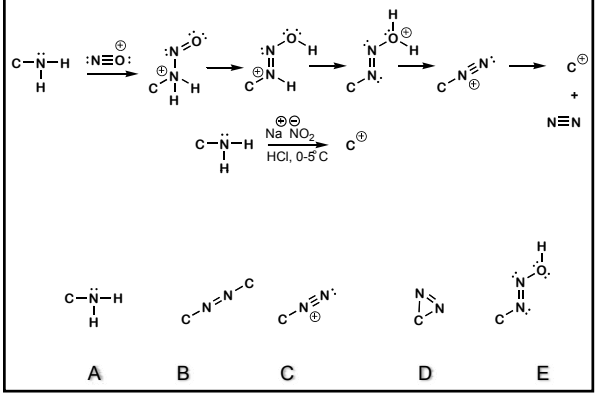
What is the first product formed when the nitrosyl cation reacts with a primary amine?



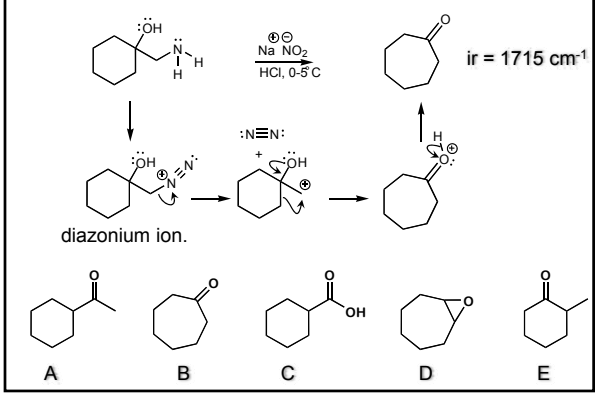
How is the nitrosyl cation prepared?



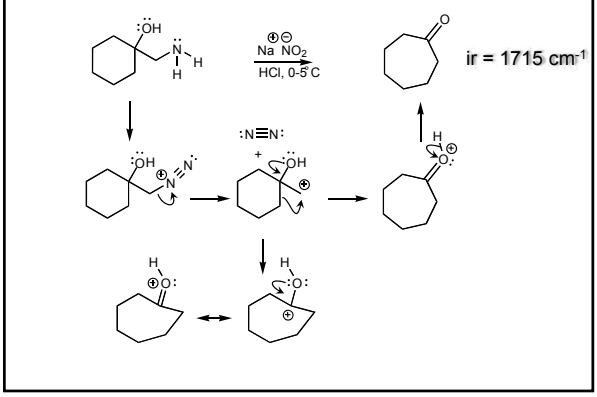
What is the product formed when the nitroso aminium ion loses a molecule of water?



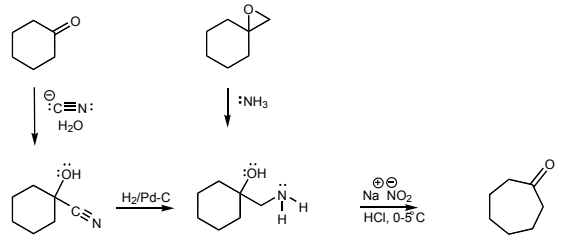
Predict the product of the following reaction



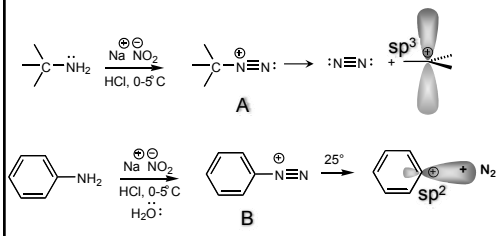
Predict the product of the following reaction



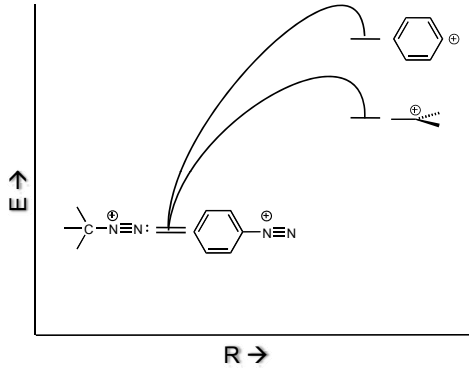
The treatment of some primary amines gives rearranged carbon frameworks. How is the following reaction occurring?



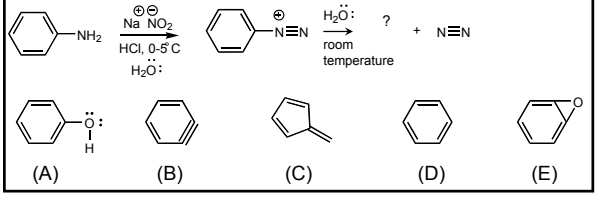
Which of the following diazonium ions is the more stable?



Which of the following diazonium ions is the more stable?

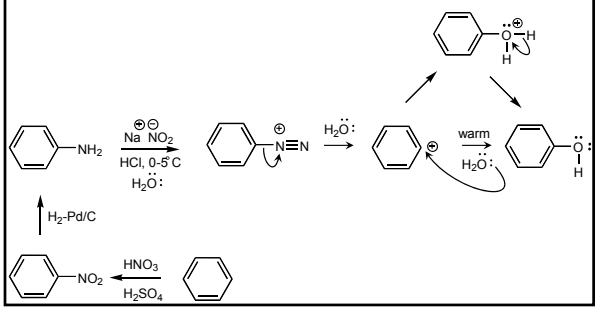


Choose the product isolated when the following diazonium ion is allowed to warm to room temperature.

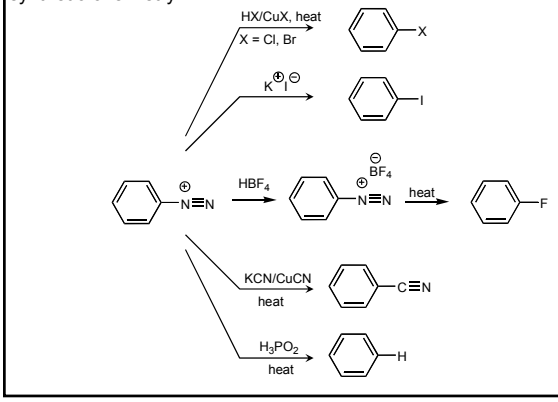


(A) (B) (C) (D) (E)

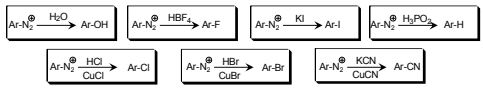
How can phenol be prepared from benzene?

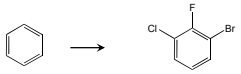


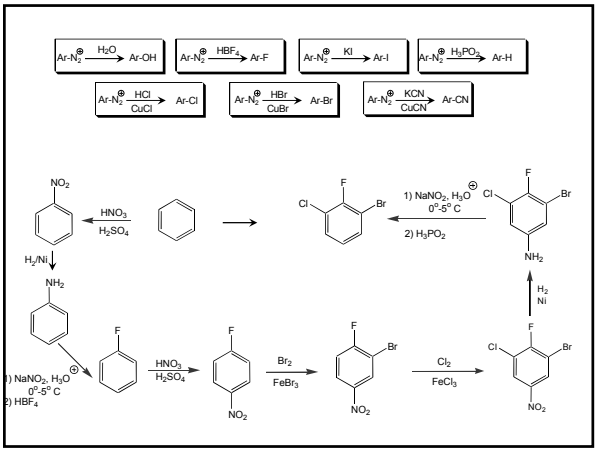
If the carbocation cannot eliminate or rearrange is it useful in synthetic chemistry?



Give a method for performing the following transformation.







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