## Answer on Question #43373 - Chemistry - Organic Chemistry

## Question:

What product do we get if methanol is used as a reaction solvent when bromobenzene and magnesium are mixed?

## **Answer:**

The reaction of bromobenzene and magnesium is used to get phenylmagnesium bromide:

Ether or THF are used for this aim, because the solvent must be aprotic since alcohols (including methanol) and water contain an acidic proton and thus react with phenylmagnesium bromide to give benzene:

So, when bromobenzene and magnesium are mixed in methanol, **benzene** and **methoxymagnesium bromide** are the products.