# CHEMISTRY PRIZE 2022

# It just says click!



Nobel Prize Lessons

## The Nobel Prize in Chemistry

#### "to the person who made the most important chemical discovery or improvement"





## Chemistry Prize 2022



The 2022 Chemistry Prize is about "click chemistry", which allows researchers to construct molecules in an effective and systematic way.

## The 2022 Chemistry Laureates

#### "For the development of click chemistry and bioorthogonal chemistry"



Carolyn R. Bertozzi Born: 1966, USA

Morten Meldal Born: 1954, Denmark



K. Barry Sharpless Born: 1941, USA

ILL. NIKLAS ELMEHED © NOBEL PRIZE OUTREACH

## Why do we want to build complicated molecules?



Our whole world is built up of molecules.

## The click reaction that changed chemistry





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We can attach almost anything to click molecules, which means we can link together many more molecules than was previously possible.



## Bioorthogonal chemistry illuminates the cell



Carolyn Bertozzi refined the method further so that it can be used in living organisms too. By attaching one of the click molecules to a fluorescent molecule and the other to a cell membrane, she could make the cell more visible under a microscope.



## For the greatest benefit to humankind

#### The click method is used frequently in laboratories all over the world.







## "When the world is in trouble, chemistry comes to the rescue"

Carolyn R. Bertozzi, Nobel Prize laureate in chemistry 2022







# FOR THE GREATEST BENEFIT TO HUMANKIND

Nobel Prize Lessons

