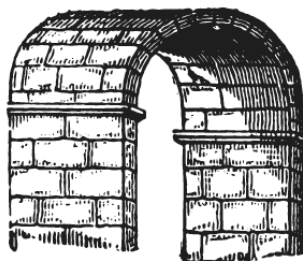
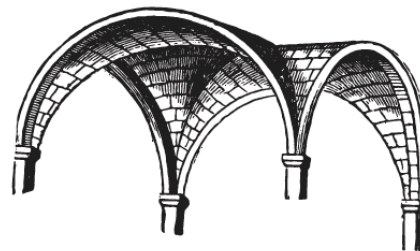


**ARCH:**  
The basic building block of Roman Architecture



**BARREL VAULT:**  
The arch extended to form a curved ceiling



**GROIN VAULT:**  
Two barrel vaults intersecting at right angles



**THE ARCH**

The arch could support heavy structures because it spread the weight of the load. Extending the depth of the arch from front to back led to the development of the *barrel vault*. In the example to the left, we see the barrel vault being used for a hallway in the ancient Baths of Caracalla in Rome early in the third century.

Barrel vaults then led to the invention of the *groin vault*. The groin vault was the result of two barrel vaults being joined at right angles, which made intersecting hallways with curved ceilings possible and led to new possibilities in architecture.