### ****1. Bit and Byte****

* **Bit**:
  + A **bit** in Java is the smallest unit of data, representing a binary value that can either be 0 or 1. In computer memory, data is stored in bits.
  + **Example**: A boolean in Java can represent a bit-like value: true (1) or false (0).
* **Byte**:
  + A **byte** is a unit of data consisting of 8 bits. In Java, the byte data type can hold an integer value between -128 and 127(or 0~255) (since it is a signed 8-bit integer).
  + **Example**: byte exampleByte = 100;