

Character Operations from Character Class

zyBook Chap 4.20

Character Class

- Within the default package `java.lang`
 - The `Character` class wraps a value of the primitive type `char` in an object.
 - An object of type `Character` contains a single field whose type is `char`.
- Syntax:
`<ClassName>.<methodName>(parameter(s))`
`Character.<methodName>(parameter(s))`

public static String toString(char ch)

- Returns:
 - a String object representing the specified char.
- For example,
`Character.toString('a');` `// "a"`

`public static int getNumericValue(char ch)`

- Returns:
 - **the numeric value of the character, as a nonnegative int value;**
 - -2 if the character has a numeric value but the value can not be represented as a nonnegative int value;
 - -1 if the character has no numeric value.
- For example,

```
Character.getNumericValue('6'); // 6
Character.getNumericValue('-6'); // Error: unclosed character literal
```

public static boolean isDigit(char ch)

public static boolean isLetter(char ch)

- For example,

```
Character.isDigit('X');    // false
```

```
Character.isDigit('9');    // true
```

```
Character.isLetter('X');   // true
```

```
Character.isLetter('9');   // false
```

public static boolean isLowerCase(char ch)

public static boolean isUpperCase(char ch)

- For example,

Character.isLowerCase('Q'); \\ false

Character.isLowerCase('n'); \\ true

Character.isLowerCase('!'); \\ false

Character.isUpperCase('Q'); \\ true

Character.isUpperCase('n'); \\ false

Character.isUpperCase('!'); \\ false

public static char toLowerCase(char ch)

public static char toUpperCase(char ch)

- For example,

Character.toLowerCase('Q'); \\ 'q'

Character.toLowerCase('n'); \\ 'n'

Character.toUpperCase('!'); \\ '!''

Character.toUpperCase('Q'); \\ 'Q'

Character.toUpperCase('n'); \\ 'N'

Character.toUpperCase('!'); \\ '!''