

Common Programming Case Styles

Definitions and **common uses** in Java/Android development



DEEP DIVE
Coding Bootcamps

UpperCamelCase (PascalCase)

- One or more words in a single identifier, no spaces or other delimiters between words, each word starting with a capital letter.
- Class & interface names¹; source code file names¹ (extensions are always lowercase); XML element names².

camelCase (lowerCamelCase)

- One or more words in a single identifier, no spaces or other delimiters between words, each word after the first starting with a capital letter.
- Method, field, parameter, & local variable names¹; XML attribute names²; JSON property names; CSS style names.

UPPER_SNAKE_CASE (SCREAMING_SNAKE_CASE)

- One or more words in a single identifier, underscores between words, all letters uppercase.
- Constant (`static final`) field names¹; SQL keywords and built-in function names.

snake_case (lower_snake_case, whispering_snake_case)

- One or more words in a single identifier, underscores between words, all letters lowercase.
- Package names¹; SQL identifiers³; Android resource names & IDs⁴; Java property keys; JSON property names; file & directory names.

kebab-case (spinal-case, lisp-case)

- One or more words in a single identifier, hyphens between words, all letters lowercase.
- URIs; CSS style names; file, directory, & repository names⁵.

1. While not required by the compiler, these conventions are followed almost universally, are addressed in the certification exams, and should be considered strict rules (with few exceptions) in this bootcamp. One acceptable variation is in package names, which are always lowercase, but often use no separators between words; this is the rule for packages created in this bootcamp. In practice, acronyms & initialisms—especially those with 4 or more characters—are generally treated as single words; however, some 2–3 character initialisms are treated as multiple words when written in camelCase or UpperCamelCase, but as single words when written in snake_case or UPPER_SNAKE_CASE. The `URLConnection` class name is an example of this practice gray area.
2. While these are common casing styles for XML, the XML standard doesn't require them. Each XML schema, DTD, or application may define its own elements and attributes, the spelling and case of which we must respect in use. In particular, attribute names in Android layout files often use a combination of snake_case and camelCase (e.g. `layout_constraintBottom_toTopOf`).
3. Some dialects of SQL are case-sensitive with respect to identifiers; thus, beyond convention, the use of lower_snake_case for column names is a strict rule in this bootcamp. Table names should be generated by the relevant ORM, if possible; when a generated name conflicts with a SQL reserved word (e.g. for a `User` entity class), the SQL identifier should be specified using lower_snake_case.
4. This is required by the Android SDK, with few exceptions. Apart from style names (often UpperCamelCase) and color names (often camelCase), lower_snake_case is a strict rule of this bootcamp.
5. kebab-case is usually preferred for file, directory, and repository names that are mapped directly to URI path components; this is a strict rule for repository names in this bootcamp.