

# Roman numerals

Standard Roman numerals (I, IV, IX, X, etc.).

```
^M{0,3}(CM|CD|D?C{0,3})(XC|XL|L?X{0,3})(IX|IV|V?I{0,3})$
```

## Token-by-token breakdown

| Token  | Meaning                                     |
|--------|---------------------------------------------|
| ^      | start of string (or line in multiline mode) |
| M{0,3} | between 0 and 3 times: the literal "M"      |
| (      | start of a capturing group                  |
| CM     | literal text "CM"                           |
|        | OR — try the alternative                    |
| CD     | literal text "CD"                           |
|        | OR — try the alternative                    |
| D?     | optional (zero or one): the literal "D"     |
| C{0,3} | between 0 and 3 times: the literal "C"      |
| )      | end of group                                |
| (      | start of a capturing group                  |
| XC     | literal text "XC"                           |
|        | OR — try the alternative                    |
| XL     | literal text "XL"                           |
|        | OR — try the alternative                    |
| L?     | optional (zero or one): the literal "L"     |
| X{0,3} | between 0 and 3 times: the literal "X"      |
| )      | end of group                                |
| (      | start of a capturing group                  |
| IX     | literal text "IX"                           |
|        | OR — try the alternative                    |
| IV     | literal text "IV"                           |
|        | OR — try the alternative                    |
| V?     | optional (zero or one): the literal "V"     |
| I{0,3} | between 0 and 3 times: the literal "I"      |
| )      | end of group                                |
| \$     | end of string (or line in multiline mode)   |

## Quick usage in 7 languages

Full breakdown, live testing & code generation: [regexguide.com/patterns/roman-numerals.html](https://regexguide.com/patterns/roman-numerals.html)

© 2026 regexguide.com · a human-curated regex explainer & pattern library

Disclaimer: provided as-is, without warranty — test against your own data before production use.

|                   |                                                                                                                    |
|-------------------|--------------------------------------------------------------------------------------------------------------------|
| <b>JavaScript</b> | <pre>const re = /^M{0,3}(CM CD D?C{0,3})(XC XL L?X{0,3})(IX IV V?I{0,3})\$/; re.test(value);</pre>                 |
| <b>Python</b>     | <pre>import re re.match(r"^M{0,3}(CM CD D?C{0,3})(XC XL L?X{0,3})(IX IV V?I{0,3})\$", value)</pre>                 |
| <b>Java</b>       | <pre>Pattern.compile("^M{0,3}(CM CD D?C{0,3})(XC XL L?X{0,3})(IX IV V?I{0,3})\$").matcher(val ue).matches();</pre> |
| <b>C# / .NET</b>  | <pre>Regex.IsMatch(value, @"^M{0,3}(CM CD D?C{0,3})(XC XL L?X{0,3})(IX IV V?I{0,3})\$");</pre>                     |
| <b>Go</b>         | <pre>regexp.MustCompile(`^M{0,3}(CM CD D?C{0,3})(XC XL L?X{0,3})(IX IV V?I{0,3})\$`).MatchStr ing(value)</pre>     |
| <b>Ruby</b>       | <pre>/^M{0,3}(CM CD D?C{0,3})(XC XL L?X{0,3})(IX IV V?I{0,3})\$/ .match?(value)</pre>                              |
| <b>PHP</b>        | <pre>preg_match('~^M{0,3}(CM CD D?C{0,3})(XC XL L?X{0,3})(IX IV V?I{0,3})\$~', \$value);</pre>                     |

## Common pitfalls

- **Anchored to the whole string.** This pattern uses ^ and \$, so it requires the entire input to match. To find it inside a longer text, drop the anchors and use the global (g) flag.
- **Validate beyond format.** Matching the format doesn't guarantee the value is real. Confirm the roman numerals against a source of truth (database, API, or checksum) where it matters.