

Regular Expressions

- Language for composing complex patterns from simpler ones.
 - An individual character is a regex.
 - Union: If e_1 and e_2 are regexes, then (e_1 / e_2) is a regex
 - Concatenation: If e_1 and e_2 are regexes, then $e_1 e_2$ is a regex
 - Repetition (Kleene closure): If e_1 is a regex, then e_1^* is a regex

Enhanced Regex's (Perl)

- Special terms for common sets of characters, such as alphabetic or numeric or general "wildcard".
- Special repetition operator (+) for 1 or more occurrences.
- Special optional operator (?) for 0 or 1 occurrences.
- Special repetition operator for specific range of number of occurrences: {min,max}.
 - A{1,5} One to five A's.
 - A{5,} Five or more A's
 - A{5} Exactly five A's

Perl Regex's

- Character classes
 - \w (word char) Any alpha-numeric (not: \W)
 - \d (digit char) Any digit (not: \D)
 - \s (space char) Any whitespace (not: \S)
 - . (wildcard) Anything
- Anchor points:
 - \b (boundary) Word boundary
 - ^ Beginning of string
 - \$ End of string