

Field Type Analyzers

This article describes the search analyzers you can use, as well as how to add an analyzer to your schema.

Add an Analyzer

To apply an analyzer with an attribute to the schema:

1. Go to **Main > Search > Schema**.
2. Click **Add** in the Field/Attribute table.
3. Choose a **Schema Type**.
 - Core fields include Product Name, Product Code, and Categories.
 - Custom Attributes refer to any unique product attributes you've created.
4. Select an attribute.
5. Select an analyzer.
6. Click **Add**.
7. When you're done adding attributes and analyzers, click **Save** and then **Publish Now** in the top right.

Analyzer Types

Kibo recommends using the `exact_match`, `lenient`, `lenient_phrases`, and the corresponding typeahead field type analyzers for the most common searched fields.

`exact_match`

Searches for exact matches to the query term without stemming or synonyms. This analyzer applies HTML stripping, lowercasing, and ASCII folding.

This analyzer is best used when you want to show matches that are exactly the same as what your customer types as a search term.

`exact_match_type_ahead`

Searches for matches based on the `exact_match` analyzer, but also includes an Edge NGram filter on the index side. This allows for search-as-you-type use cases where a partial query can return search results that match a term that completes it. For example, a partial query of “piz” can return a result of “pizza.”

`lenient`

Searches for exact matches to the query term, but also applies stopword filtering, stemming, and synonym expansion to allow for more matches. This analyzer applies HTML stripping, lowercasing, and ASCII folding.

This analyzer is a good general-purpose analyzer to use for most fields that contain English text.

lenient_type_ahead

Searches for matches based on the `lenient` analyzer, but also includes an Edge NGram filter on the index side. This allows for search-as-you-type use cases where a partial query can return search results that match a term that completes it. For example, a partial query of “piz” can return a result of “pizza.”

lenient_phrases

A supplemental filter to use with `lenient` that also applies shingle filtering. This filtering makes the analyzer prefer term order in the query. For example, the search term "chocolate milk" matches better to "chocolate milk" than to "milk chocolate."

This analyzer does not use stopwords filtering and synonym expansion to prevent undesirable interactions with the shingle filter.

lenient_phrases_type_ahead

Searches for matches based on the `lenient_phrases` analyzer, but also includes an Edge NGram filter on the index side. This allows for search-as-you-type use cases where a partial query can return search results that match a term that completes it. For example, a partial query of “piz” can return a result of “pizza.”

return_only

An analyzer you can use with type ahead analyzers to display which products and categories to display as suggestions within the search experience. The example below shows the `productName` and `categoryName` fields enabled and what information is displayed during a type ahead search.

The screenshot shows the Banana Republic website's search interface. The top navigation bar includes the GAP logo, brand names (OLD NAVY, BANANA REPUBLIC, ATHLETA), and utility links (FREE SHIPPING ON \$50+, FOR REWARDS MEMBERS, SIGN IN OR JOIN, DETAILS, Sign In, Your Account). The main content area features a navigation menu with 'NEW', 'WOMEN', 'MEN', and 'HERITAGE'. A search bar contains 'men's sh' with a magnifying glass icon. Below the search bar, a 'PRODUCT RESULTS' section displays six items in a grid:

Product Name	Price
Brendt Suede Chukka Boot	\$180.00
Nicklas Leather Sneaker	\$128.00 (Sale: \$98.00 - \$128.00)
Hadley Italian Leather Brogue Oxford	\$158.00
Nicklas II Leather Sneaker	\$140.00
Hinto Italian Leather Oxford	\$158.00 (Sale: \$94.97 - \$158.00)
Dellbrook Italian Leather Loafer	\$148.00

To the right of the product grid is a category suggestion dropdown menu. It lists 'mens shoes' and 'Search "mens shoes" in:'. Under the heading 'MEN', the following categories are listed: mens shorts, mens shirts, men shirt jacket, short sleeve men, men short sleeve shirts, mens shawl-collar cardigan, and men shirts on sale. A red arrow points to the 'men shirts on sale' category.

french_*

All English analyzers above can be used in French with this prefix instead. These analyzers use the French elision filter, the French stopword dictionary, and the French stemmer.

spanish_*

All English analyzers above can be used in Spanish with this prefix instead. These analyzers use the Spanish stopword dictionary and the Spanish stemmer.

noun_extraction

A natural language processing analyzer that identifies the most important word in a product title. This word identifies what the product is and is used to boost these matches.

For example, if you have a product named "leather fireplace gloves - assorted colors," the search term "gloves" matches with this analyzer, while the term "fireplace" does not.

code_exact

A code search analyzer that allows for matching product codes such as SKUs, UPCs, and part numbers. This analyzer looks for case-insensitive exact matches. For example, the search term "234a-543b-323y" matches the SKU "234A-543B-323Y."

code_lenient

A code search analyzer that allows for matching product codes such as SKUs, UPCs, and part numbers. This analyzer looks for case-insensitive matches that might include additional spaces and punctuation. For example, the search term "234a543b323y" matches the SKU "234A-543B-323Y."

code_lenient_ta

A code search analyzer that allows for matching product codes such as SKUs, UPCs, and part numbers. This analyzer allows for search-as-you-type matches of individual components of a code. For example, the search term "234" matches the SKU "234A-543B-323Y." Searching for a larger fragment of the SKU such as "234A-54" yields a better score.