**Offline Coding Evaluation**

Products RESTful API

# A. Introduction

The objective of this exercise is to understand the way you design and implement software to fulfill customer requirements; thus, **take advantage of this opportunity to show how good software engineer you are**. We will not only evaluate that the software does what it was requested, but also how it was implemented, so we suggest to follow software engineering best practices that demonstrate that you are able to develop high-quality software.

# B. Requirements

Designing and implementing an application that allows to store new product, list all of them, retrieve a product by its SKU, update it and delete it. The information of a product that we want to store is:

|  |  |  |  |
| --- | --- | --- | --- |
| **Field** | **Description** | **Data allowed** | **Required** |
| **SKU** | Internal stock-keeping unit. It is the candidate identifier of a product | Min: FAL-1000000 Max: FAL-99999999 | Y |
| **Name** | Short description of the product | Must not be blank  Min size: 3  Max size: 50 | Y |
| **Brand** | Name of the brand | Must not be blank  Min size: 3  Max size: 50 | Y |
| **Size** | Size of the product | Must not be blank | N |
| **Price** | Sell price | Min: 1.00  Max: 99999999.00 | Y |
| **Principal image** | URL of the principal image of the product, which is used in catalogs and is the first image that is showed to  customers when access product detail page | URL format | Y |
| **Other Images** | **List** of images of the product. | URL format | N |

**Additional considerations:**

* The designed endpoints must use proper HTTP verb, REST naming conventions and return correct HTTP code.
* The application must not expose technology detail, such as language, framework, libraries, and so on, when an exception is thrown.

**Example data:**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **SKU** | **Name** | **Brand** | **Size** | **Price** | **Image URLs** |
| FAL-8406270 | 500 Zapatilla Urbana Mujer | New Balance | 37 | 42990.0  0 | • https:// |
| FAL-8819522 83 | Bicicleta  Baltoro Aro 29 | Jeep | ST | 399990.  00 | * https:// |
| FAL-8818985 02 | Camisa  Manga Corta  Hombre | Basement | M | 24990.0  0 | • [https:](https://falabella.scene7.com/is/image/Falabella/881898502_1) |

# C. Technology Required

* Golang
* Go mod
* Gin
* Gorm
* Persistente technology is part of your architectural decision
* Must have unit testing
* D. Deliverables

The only deliverable is the source code of the solution; it must be published at a GIT version control hosting such as: GitHub, GitLab, Bitbucket or other. The repository must have a

README.md file which contains:

* Build and execution instructions
* Brief explanation about architectural and technological decisions made for the application.