1. oPERATIONAL SERVICE DESCRIPTION TEMPLATE

**Operational Service Description for the *xxx* Service**

1. INTRODUCTION

The *blue italic text* is meant to be replaced by those producing the Operational Service Description (OSD). The non-italic text is not necessarily meant to be replaced but may be used as example text.

* 1. Purpose of the Document

This template shall support the service architects in creating a description of the services (put down in writing) at a high level of abstraction. This template provides descriptive instructions for the intended content for each section. Formally, such instructions are written in blue italic font – they shall be deleted when writing the actual service specification document. In addition, some parts of this template provide suggested text fragments that may be directly re-used in the service specification document. Such proposed text fragments are given in black normal font.

The purpose of this OSD is to provide information needed to develop the service specification(s) and the technical service(s).

* 1. Context of the operational service

This section provides information about the context of the Operational Service.

*The context of the Operational Service gives the service specification developer information about the rationale of the service. Furthermore it must provide information about the relationship between the Operational Service and Maritime Services (MS), such as specifying the MS or part of MS covered by this Operational Service. If there are parts of the MS that are realized by other Operational Services this should be stated here.*

* 1. objective of the service

This section provides information about the objective(s) of the Operational Service.

The Operational Service should have very clear objectives. These objectives should be described in Specific, Measureable, Achievable, Realistic, and Timely (SMART) terms. The section should give a clear description of what the Operational Service is intended to do.

* 1. Intended users of the service

This section provides information about the intended users of the service.

Give a clear description about the users or groups of users intended to make use of the Operational Service. This can be ship board users and/or shore side users, such as maritime authorities, pilots, port authorities, etc.

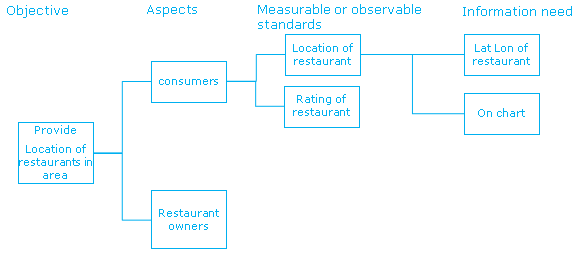
1. Information needs

This section provides the information needs that are to be fulfilled by the Operational Service.

This section should state very clearly the information needs the Operational Service covers. Information needs may be different for the different users of the operational service.

There are numerous techniques that can be used to obtain the information needs. There is no prescribed method to do this as long as the information needs are described in a clear way.

For example: Use the objective of the service as the starting point for the analysis. Based on the objective identify the most important aspects of the (sub)objective. From the aspects you can derive measurable or observable standards. This then will lead to the specific information needed. Figure 1 shows a practical schematic example of this method of information analysis.



1. Schematic example of information analysis

The results of the information analysis need to be captured in a matrix. This is necessary for requirement traceability and ensures that the objectives are being realized.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| *Provide location of restaurants in area* information need matrix | | | | |
| Aspects | Measurable/observable standards | Information need ID | Information need | Necessary operations |
| *Consumers* | *Location of restaurant* | *C.IN.1* | *Lan Lon of restaurant* | *Convert from X,Y* |
| *Consumers* | *Location of restaurant* | *C.IN.2* | *Rating of restaurant* | *None* |
| *Consumers* | *Rating of restaurant* |  |  |  |
| *Restaurant owners* |  |  |  |  |

1. By the service provided information needs
2. Features

This section describes the main features. Table 2 lists the main features and the descriptions of the Operational Service.

Description of the features of a service will provide the developer of the service specification the input for the development. For the description of the features it is helpful to use the following guidance:

The feature should be described as a statement: “As a <type of user> I want to <do something> so that <some reason>.”

As a check the INVEST[[1]](#footnote-1) method can be used to assess the quality of the feature description.

A good feature description should be:

* Independent (of all others)
* Negotiable (not a specific contract for features)
* Valuable (or [vertical](http://guide.agilealliance.org/guide/incremental.html))
* Estimable (to a good approximation of the development effort)
* Small (This applies more for the underlying user stories)
* Testable (in principle, even if there isn’t a test for it yet)

The feature descriptions need to be documented. This necessary for traceability and ensures that the features are being realized.

|  |  |
| --- | --- |
| **Feature identifier** | Feature description |
| F.001 | Example: As a mariner I want to be able to retrieve the weather forecast for my location at any time so that I can display it on my electronic chart |
| F.002 |  |
|  |  |

1. Feature description table
2. Guiding Principles

* 1. Architectural parameters

This section describes the architectural parameters for the operational service.

List the architectural parameters for the operational service. Architectural parameters should specify the scope and rationale for the service specification developers. Example: “Maritime Safety Information must be provided within the S-100 data framework.” Rationale: “Harmonization between services must be achieved.”

* 1. Functional and Non-functional Requirements

Functional requirements are mainly derived from the user needs in the development of the service specification process. The OSD is input for the service specification process. Therefore the functional requirements that can be stated at this stage will be limited.

In this stage non-functional requirements can be drafted. A non-functional requirement is a specification that describes the system’s operation capabilities and constraints that enhance its functionality but do not affect the functionality itself. Non-functional requirements could be e.g. speed, security, reliability, maintainability, scalability, etc.

Table 3 lists applicable Requirements for the *XYZ* service.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Requirement type** | Requirement Id | Requirement Name | Requirement Text | Feature identifier |
| Functional |  |  |  |  |
| Non-Functional |  |  |  |  |
|  |  |  |  |  |

1. Requirements for the operational service

1. The acronym [INVEST](http://xp123.com/articles/invest-in-good-stories-and-smart-tasks/) helps to remember a widely accepted set of criteria, or checklist, to assess the quality of a [user story](https://www.agilealliance.org/glossary/user-stories/). If the story fails to meet one of these criteria, the team may want to reword it, or even consider a rewrite [↑](#footnote-ref-1)