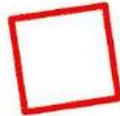


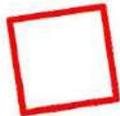
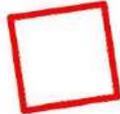
Deliverable 2.3

First Version Plan

kpi
key performance indicator



THE GLOBAL GOALS



Union for the Mediterranean
Union pour la Méditerranée
الاتحاد من أجل المتوسط



MAST
Mediterranean Alliance
for Sustainable Tourism

The Partnership



European Institute for Local Development



University of Eastern Piedmont Amedeo Avogadro



Mediterranean Academy of Culture, Technology and Trade



Union Maghrébine et Nord Africaine des Agriculteurs



Regional Observatory of Agriculture and Development

With the financial support of



On behalf of



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Table of Contents

I.	Introduction	4
II.	Theoretical background	6
III.	Methodology	7
IV.	Objective of KPIs planning	8
V.	KPIs per Domain	9
VI.	Models	10
VII.	Analysis	14
VIII.	Conclusion	16
IX.	References	17

I. Introduction

A Key Performance Indicator (KPI) is a quantifiable metric that reflects how well an organization is achieving its set goals and objectives. For example, if one of the goals is to provide superior customer service, a KPI can be used to target the number of customer support requests that remain unsatisfied at the end of each week. This will measure the progress toward the objective. Excellent customer service, as far as it concerns us, results in a high level of satisfaction and encourages customers to return and to make recommendations to others. Travel and tourism organizations realize that consistently high standards of customer service will ensure customer loyalty and improve business performance.

KPIs link organizational vision to individual action. An ideal situation is where KPIs cascade from level to level in an organization. The pyramid has strategic vision at the top, feeding down to specific actions at the bottom. In the middle you'll find the KPIs that have been derived from the strategy, objectives, and Critical Success Factors (CSFs) of the organization. CSFs are the areas of activity in which the organization must perform well in order to be successful. KPIs are the means by which these CSFs can be measured. The actions below the KPIs are the tasks and projects to be carried out in order to achieve the KPIs.

You can visualize this by thinking of the organization as a pyramid, as shown in Figure 1, below (Mind Tools Content Team, n.d.).



Figure 1: How KPIs fit into an organizational structure (Source: Mind Tools) (Modified from source: Mind Tools)

Today tourism services offer means to achieve higher revenue and profit. In addition, services provide a chance to differ from competitors. Since services in the industry become more and more important and the companies depend on turnovers from their services, the provision of services overall should be closely examined with regard to time, cost and quality.

During service delivery, many influences and disruptions affect the delivery process. Both demand and supply of services are exposed to various types of uncertainty, especially during the COVID-19 period and in the area after the end of it.

Thus, companies are forced to closely monitor the provision of their services regarding efficiency and effectiveness. To this end, certain methods, such as performance measurement, need to be developed and implemented. Measuring the performance of the service is required to identify potential improvements for the organization itself based on past and current data. Appropriate measurements are needed to quantify and understand the status quo, to identify deficits within the organization, to implement measures and finally to assess the impact of measures implemented to improve services.

Performance indicators, which can be defined as "items of information collected at regular intervals to track the performance of a system ", are the basis for evaluating and benchmarking the performance of organizations and their processes. Performance indicators help control the provision of services by allowing the comparison of planned and achieved results. Different approaches are used to classify service performance indicators. For example, there are classifications by service (process, potential and result), performance (quality, cost, time, customer satisfaction, flexibility) or by type of service (e.g. maintenance, scheduling, repair and logistics) (Meier et al., 2013).

I. Theoretical background

Today, tourism organizations are forced to compete in highly complex and globalized environments, facing enormous physical, economic and technological challenges on a daily basis. Meeting these challenges would be impossible without sound management of their business performance. This is essential for any business, regardless of size, scope or resources, to determine, measure, understand and monitor the progress of this performance.

Measurement systems are required to set organizational goals and control improvements by monitoring efficiency and effectiveness. A common approach to performing these metrics is to use KPI metrics. KPIs provide an objective criterion for measuring business activity and project success and are an extremely important part of corporate strategy for business forecasting, measurement and planning. However, it should be noted that performance metrics differ in their purpose, definition and content. Therefore, different methodologies are used to define and select the KPIs, to ensure that they fit the competitive environment, and strategy. The following should be considered for optimal selection: power, utility and relevance, and to ensure that the metering system is under control, a disciplined methodology is required.

The lean approach has been explored to determine, measure and monitor performance. The methodology focuses on continuously improving the efficiency of the process and allows decision-making based on factual data and analysis of data, information and objective data collected through quantification and estimation methods. The lean approach is characterized by the management of the efficiency and effectiveness of the organization, emphasizing on the value of customers and waste reduction. Thus, it consists of a set of principles and tools that have been applied to a wider range of industries. Although it originated in manufacturing, it has also been applied to non-industrial organizations, such as tourism. Special emphasis

has also been placed on a wide range of industries such as sales, product development, project management and Research and Development.

The measures on which the success or failure of a project is judged are the success criteria and the KPIs are the factors that constitute those success criteria. Project management KPIs are crucial as they enable the progress of projects to be monitored. It must be ensured that KPIs are aligned with the organisation's strategies, that the perspectives of all stakeholders are considered and that short- and long-term benefits are covered. Regarding the relationship between project management performance and project success in project-based organisations the KPIs of the project management are the most significant variables for the success of a project. Measuring R&D and Innovation (R&D&I) project performance and if a project is successful or not in project-based companies has become a fundamental concern for managers and executives in the last decades. As a result, the issue has been extensively debated in the literature. However, determining whether an R&D&I project is successful is a subtle matter and a challenging task (Cruz Villazón et al., 2020).

II. Methodology

For the MAST Project we conducted research on all the KPIs which are related to the tourism sector across the countries of the Mediterranean region. The findings were qualitative and quantitative. Through the design and development of the KPIs Plan for the whole project, we intend to re-design and to re-define the approach of reading the data in the sector of tourism and its branches. The partnership follows a qualitative method of data's reading, in contrast with the majority of similar past approaches which were based mostly on quantitative data. Furthermore, this approach is more than related to the new status quo which was raised during the recent years due to the Covid-19 crisis. The tourism trends have changed and we consider that a qualitative reading of the data is more compatible with the new

conditions. Finally, the partners will proceed to a combination of KPIs in order to extract the project's results.

IV. Objective of KPIs planning

In this paper, a key performance indicator (KPI) is understood as any kind of metric to quantitatively measure the performance of a system or the processes within an organization. The purpose of collecting data and calculating KPIs is to measure and assess the performance of the service organization and to analyse the effectiveness and efficiency of measures which have been taken to improve the planning and delivery of industrial service processes within the organization. Consequently, those KPIs need to fulfil some fundamental requirements.

Goal congruence and operationalization: The KPIs must reflect and operationalize the overall objectives of the organization. Thus, in the context of industrial service delivery, KPIs must be able to quantitatively measure the extent to which the customers' requirements and needs have been fulfilled and at which costs or with which effort this could be achieved.

Measurability: The KPIs must be clearly defined and quantitatively measurable without inordinate expenses. That means that required data should be available or obtainable without laborious investigation or surveys.

Precision and tamper-proofness: The definition and calculation of KPIs must not leave any room for interpretation or manipulation.

Controllability: The KPIs should be the cause of conscious decisions, i.e. endogenous variables which can be controlled by the service manager through qualified decisions. Therefore, KPIs which must be considered exogenous variables for the delivery planning and service delivery processes will not be used to measure the performance of delivery planning and service delivery.

Based on these requirements, the KPIs that will be selected have been chosen for assessing delivery planning and service delivery. For each KPI a short description and a reference to the unit or dimension in which the KPI is typically measured are given. The listed key performance indicators are a representative selection, but they are not to be understood as a comprehensive compilation of all relevant KPIs; this would be impossible within the scope of this plan of KPIs paper. Furthermore, each service organization should define a specific selection of those KPIs fitting in optimization objectives and data availability.

V. KPIs per Domain

Regarding indicators in general, a distinction between absolute numbers and relative numbers has to be made, absolute numbers are independent from other indicators. The performance of a process can be defined as the extent to which the outcome of the process is able to fulfil the requirements of the internal or external customers of this process. Within a business as a system of various departments, interconnected material and information flows and complex process chains, the performance of a particular process cannot be measured independently. In this context, interdependencies with upstream supplying processes, disturbances and the setting of control variables or parameters are important factors of influence which need to be taken into consideration when the performance of a process is assessed. These basic categories of influence factors (supplier performance indicators, disturbance variables and control variables).

VI. Models

At this point, it is useful to mention the difference and the relevance between KPAs/ KRAs and KPIs. “Key Result Areas” or KRAs, also called “Key Performance Areas” (KPAs) refer to general areas of outcomes or outputs for which a role, or a combination of roles, is responsible. Based upon an agreed measurement, Key Process Indicators (KPIs) are used for each Key Process Area (KPA) to determine where the organization ranks. KPAs are defined objectives that are vital to the performance of an individual employee, a department or an organization. Each KRA probably has multiple KPIs associated with it. The state of implementation of that KPI will determine where the organization is measured. Mostly, an aggregation of all the KPIs for a particular KPA determines the final KPA measurement and status (Badawy et al, 2016) .

Furthermore, Figure 2 provides us with an example of the interactive connection between different KPAs (van der Duim et al., 2015). More specifically, 8 KRAs are included in the procedure of an organization performance’s measurement; joint planning, legal status & institutional arrangements, sustainable financing, policy harmonization, sustaining & restoring landscape dynamics, integrated management, integrated development, benefit flow management. Therefore, the performance’s measurement of an organization, an individual or a department can be considered a cross-sectoral and multi-level process.

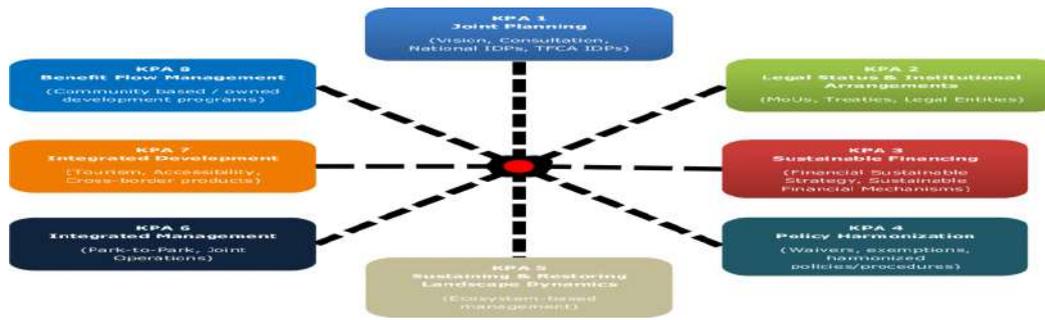


Figure 2: The eight Key Performance Areas (source “Institutional Arrangements for Conservation, Development and Tourism in Eastern and Southern Africa”, van der Duim et al., 2015).

Figure 3 includes an example of measurement via KPIs and the sequence of its structure’s breakdown. In the first level, the goal of the measurement is defined (Eshtaiwi et al., 2018). The next level is related to the Key Result Areas and in the context of the lowest level the KPIs of each area are included. This structural breakdown is helpful regarding the understanding of the KPIs determination as the consequent measurement which is applied on individuals, organizations or departments. All in all, the measurement can be based on qualitative, quantitative or combined form of KPIs. As it has been already mentioned, the KPIs which will be used during the MAST Project are qualitative not only due to the pandemic’s impact but also due to the trends’ turn in the tourism industry which has appeared after the pandemic’s spread.

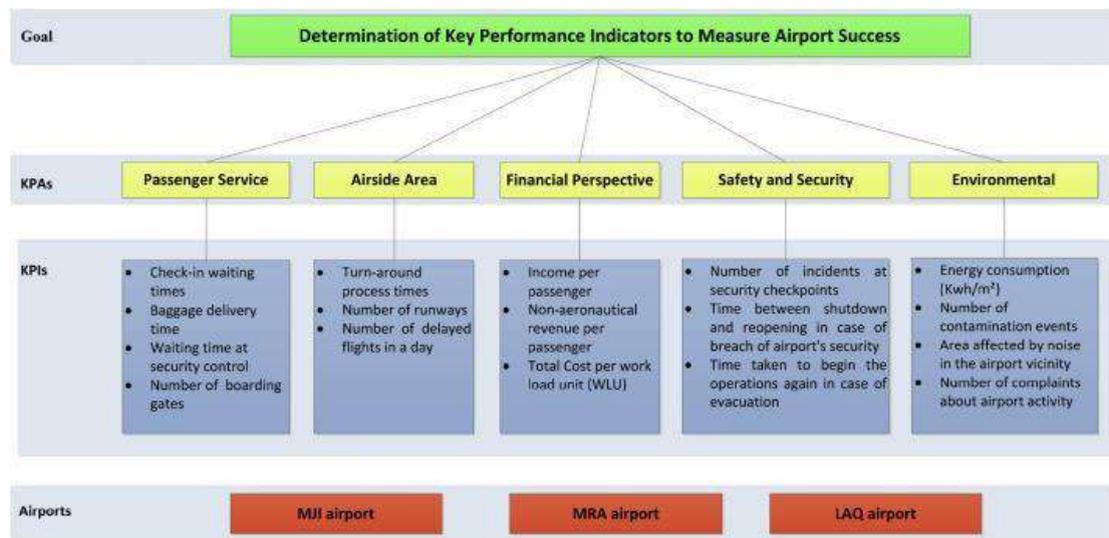


Figure 3. Determination of key performance indicators for measuring airport success (source “Determination of key performance indicators for measuring airport success: A case study in Libya”, Eshtaiwi et al., 2018)



Figure 4. KPIs Effectiveness Criteria (source www.bakertilly.com, “Utilities Leverage Key Performance Indicators to Evolve”, 2016)

KPIs should be meaningful, as they should follow strategic direction and positioning. Materials Management KPIs assist businesses/organizations to track and manage inventory in order to improve purchasing and production processes, cash flow cycle, and profitability. Moreover, a) evaluation, b) re-evaluation, c) specific, measurable, attainable objectives, d) relevance and e) time-bound are among the components which lead to a smart practice for KPIs management. Finally, a tactical plan (Figure 5) of a measurement’s procedure consists of 7 different steps; definition of the mission, setting goals, definition of objectives, determination of KPIS which will be used, strategy determination, tactics implementation, metrics gathering & analysis.

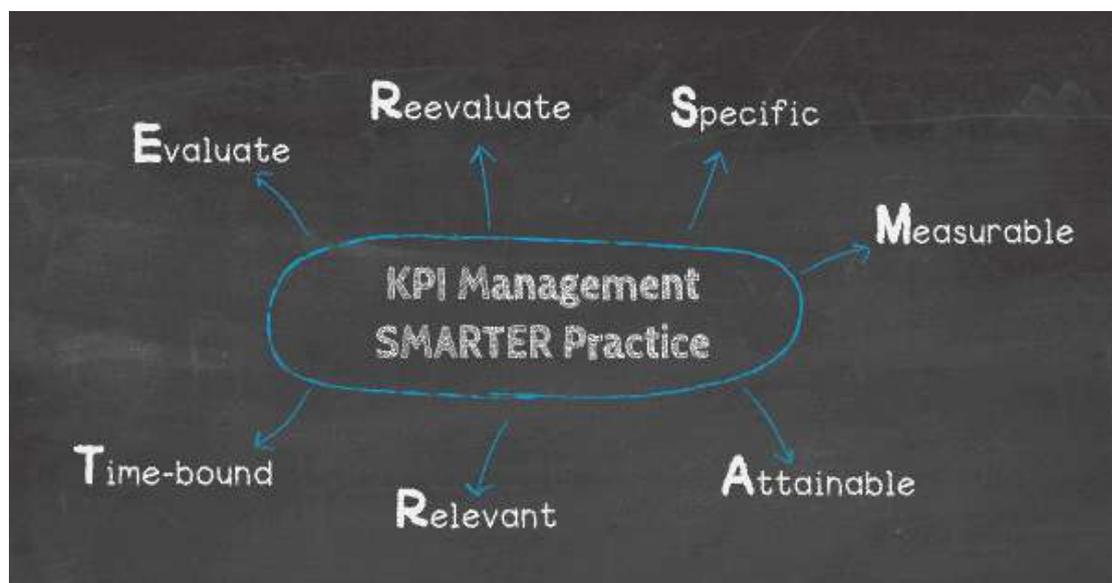


Figure 5. Effective KPI Management: SMARTER Practice (source www.datapine.com, “KPI Management And Best Practices: How To Find The Perfect KPI Solutions?” Durcevic, S. 2019)

Tactical Planning Showing Mission Goal Objective KPI & Strategy



Figure 6. Tactical Planning Showing Mission Goal Objective Kpi And Strategy (source <https://www.slideteam.net>)

VII. Analysis

The approach and the methodology followed by the partnership contribute to the promotion and establishment of a series of innovative parameters which meet the new conditions that have been created due to the pandemic crisis. More specifically, the first parameter is connected with the volume of tourists, and is related to the average spending. In contrast with the trends prior to the pandemic, which focused on total spending of tourists, this turn regarding the volume of tourists is significant considering the limitations which have been established due to the new status quo, and the crowding parameter (Lama & Rai, 2021). Therefore, it is an approach which focuses on individual spending.

Moreover, an innovative parameter which is promoted through the project is the tourists satisfaction's measurement after their departure from a touristic destination. It is a qualitative approach, as it concerns the evaluation of the visited places by the tourists. Furthermore, the measurement of tourists' percentage that will visit the same place during the next year is included in the context of the same parameter. Tourists that visit a specific place on a regular basis are usually satisfied with the quality of provision and services (Noe et al., 2010). The evaluation of different touristic periods can be considered as a measurement of comparative data, while the satisfaction's categories are related to qualitative data.

In the meantime, the volume of services is approached in relation with the local communities (whose places are chosen by visitors/tourists) and the tourists' satisfaction. As it has been already mentioned, the tourists satisfaction's percentage is connected with the quality of the services which are provided by the accommodations and the businesses in the wider context of a local community (Yachin, 2018). Furthermore, the high-level quality of services can contribute to the growth of a local community via the rise of the tourists' arrivals and their expenses. In other words, this parameter concerns cross-sectoral data and is mainly related to qualitative data.

The most significant parameter- on which the partnership focuses- is the pandemic's societal impact. More specifically, a new tourism model is promoted, and it is different in comparison with the traditional mass tourism model that dominated before the Covid-19 spread. Besides, the visitors' preferences have changed, during the last couple of years. The visitors avoid the over-crowding destinations, while they prefer alternative and safe destinations (Marques Santos et al. 2020). Additionally, the MAST project promotes destinations, in the context of which a variety of outdoor activities is offered. The partnership tends to promote the replacement of mass tourism's all inclusive practice, in the context of which visitors used to remain at their accommodation during the whole stay.

In addition, there is another interpretation of the abovementioned orientation which is promoted through the MAST project. The tourists' activation - beyond the limited space of an accommodation- can be considered as a practice which encounters the social-economic impact of the pandemic. The majority of a local community's businesses as the community itself (touristic or non) can gain economic benefits via the visitors' expenses (Rasoolimanesh & Jaafar, 2016). Considering the pandemic's significant societal and economic impact, this approach contributes to the per capita income rise and to the decrease of the unemployment rates via the creation of additional job vacancies in the context of a local community. In conclusion, it is a measurement of qualitative data regarding the societal impact of the pandemic.

VIII. Conclusion

The evaluation of the provision of tourism services is the basis for revealing effective or ineffective planning of service provision and a careful analysis should be made in case measures should be taken to optimize the performance of an organization in the field of service provision. KPIs can be classified based on scheduling or service relevance. This classification helps both management and the developer identify the root causes of problems or inefficiencies.

For this purpose, a list of relevant performance indicators has been presented, which have been differentiated according to the two dimensions planning relevance and delivery relevance.

Professionals or other users should select their individual service performance indicators with caution. The performance indicators, referred to in this paper, serve as a good starting point for companies that are launching a KPI-system for the first time within a service organization, but should by no means be considered to be complete or universally valid.

Hereby, the first step on the way to a KPI-system is done. Future works should address the underlying interdependencies between the KPIs and the influences on KPIs, so that profound recommendations for improvement measures can be derived from the examination of the performance indicators. In order to be able to do this, the determining factors such as control variables and disturbance variables have to be identified.

Their impact on important performance indicators should be qualitatively and quantitatively examined in order to develop a decision-support-system for managing the service delivery organization.

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