Fare Collection 101
Fare Systems Project Management

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A fare collection system touches every part of a transit organization

▸ **Finance** – Responsible for accounting for the funds collected by the system

▸ **Information Technology** – Manages the data generated by the system

▸ **Planning** – Develops the fare policy enforced by the system

▸ **Maintenance** –Maintains the equipment that makes up the system

▸ **Operations** – Oversees customer service and operation of the system

▸ **Marketing** – Responsible for selling the system to the public

Each of these stakeholder groups needs to be represented and engaged throughout the project

Forming a steering committee allows the project team to make informed, consensus-based decisions

▸ The steering committee should consist of at least one member from each of the stakeholder groups

▸ Each committee member needs to be granted decision making power for their part of the organization

▸ A steering committee member representing executive management will help the flow of information and prevent management by decree

▸ Most mission-critical decisions should be brought to the steering committee for discussion and resolution

When properly chosen, the steering committee members become the project champions within the agency

It is the role of the project manager to assemble the project team and act as both a leader and a facilitator

▶ A strong project manager should bring organization, focus, and an independent prospective to the project

▶ The project manager should select team members based mainly on their knowledge of agency operations and policies as they relate to fare collection

▶ While expertise in specific fare collection technologies is also useful, this knowledge may be gained along the way

▶ The project manger is responsible for defining how the team assesses and makes decisions about key aspects of the fare collection system

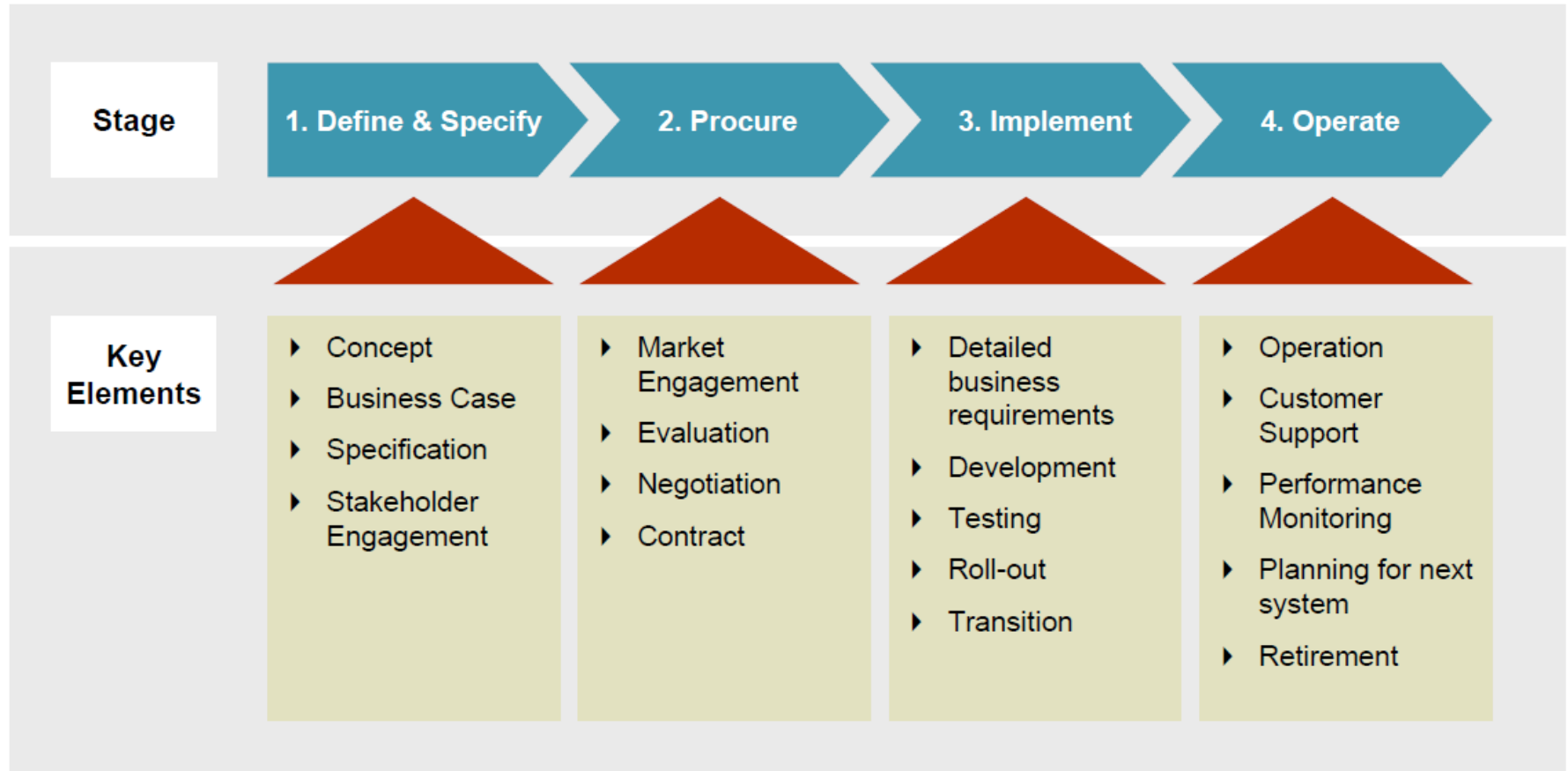# The focus should be on leading the process, not driving the decisions

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There are critical project management decisions at all stages of the project life cycle

Stage	1. Define & Specify	2. Procure	3. Implement	4. Operate
Key Elements	▸ Concept ▸ Business Case ▸ Specification ▸ Stakeholder Engagement	▸ Market Engagement ▸ Evaluation ▸ Negotiation ▸ Contract	▸ Detailed business requirements ▸ Development ▸ Testing ▸ Roll-out ▸ Transition	▸ Operation ▸ Customer Support ▸ Performance Monitoring ▸ Planning for next system ▸ Retirement

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The definition stage begins by developing a clear understanding of the project objectives

▸ Fare collection projects can often start with a simple desire to move to the "latest and greatest" technology

▸ However, choosing a technology before fully understanding the project objectives will only limit flexibility down the road

▸ Focusing instead on the "why" will help make for a more informed "what" decision later on

▸ Not every technology is right for every agency or every application

The technology should be an enabler to help an agency reach its objectives, not an objective itself

A gaps analysis will help define the project objectives by identifying the primary issues with the current system

▸ The analysis begins with a detailed look at the current processes, policies, and infrastructure used to collect fares

▸ Stakeholder input can be used to identify issues and areas of concern – or gaps – within the current system

▸ By classifying and ranking issues, the project team can determine which of these the new system should attempt to resolve

▸ Resolution of the gaps will tie to a desired "end state" that can be expressed as a set of clear goals for the project

This process will often lead to establishing goals that were not apparent at the project onset

Resources are widely available to help agencies make informed decisions and adopt best practices

Peer Agencies

▸ Peer agencies are easily accessible and are one of the best sources of real-world experience with different technologies

▸ APTA Fare Summary / Fact Book

▸ National Transit Database

Suppliers and Consultants

▸ A **Request for Information (RFI)** can be issued to build knowledge of a specific technology or obtain feedback on a potential fare collection strategy

▸ A consultant that acts as a trusted advisor and who shares best practices can help the steering committee avoid common pitfalls

These resources can be used by agencies to narrow in on a solution that will meet the project objectives

A solid solution will lead to a solid business case and implementation plan

▸ An understanding of the cost of implementation and changes to existing business processes and practices are essential to the success of the project

▸ A defensible business case will assist in seeking the appropriate project funding and justifying any organizational changes

▸ Primary consideration in the business case is to:

 – Balance capital investment against long term operating cost savings

 – Understand operational impacts

 – Recognize changes to customer practices
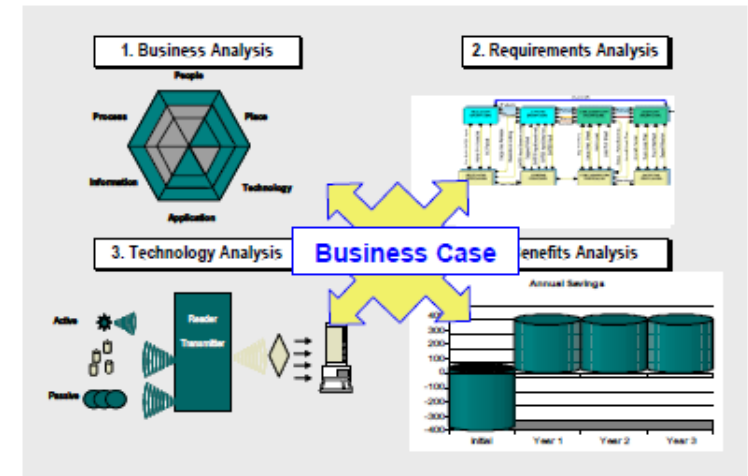
The business case should look to quantify how project objectives will be met wherever possible

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A specification is developed around the chosen solution and defines the agency's requirements for the system

▶ Technical Specification

– Provides detailed design and operational requirements for the system

– Best when the buyer knows exactly what type equipment they wish to procure

▶ Functional Specification

– Focuses on the user's interaction with the system

– Best when the buyer is looking for vendors to propose different ways to meet the requirements

▶ Most fare collection specifications use a hybrid approach and require the vendor to provide both equipment and services

The specification becomes one of the main procurement documents issued as part of the Request for Proposal

Prior to issuing an RFP, the agency can distribute a draft of the system specification for industry review

▸ Similar to an RFP, the industry review is advertised by the agency and the document is sent out to all interested vendors

▸ Vendors are given a period of time to review the documents and provide comments back to the agency

▸ Vendors may make recommendations regarding the proposed solution or suggest that items be clarified within the project scope, but no specific pricing is discussed

▸ The agency may chose to modify the specification based on the comments received, or ignore them, so long as doing so doesn't offer a vendor a competitive advantage

The industry review builds interest within the vendor community leading to a more competitive procurement

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The objective of the procurement process is to obtain the best solution and value while managing risks

- ▸ A forthcoming RFP must be sufficiently advertised in order to:
  - – Build and maintain market interest in the project prior to the RFP release
  - – Keep the market fully informed about the procurement process being used
  - – Provide the market time to prepare and respond to the RFP

- ▸ Establishing a wide-spread awareness of the project at the commencement of the procurement process encourages vendor participation and competition

- ▸ Competition, in turn, leads to better solutions being proposed and better value for every dollar spent

Hosting a pre-bid conference helps identify probable bidders and ensure a level playing field

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There are a number of approaches an agency can take when procuring a new fare collection system

▸ One-Step Procurement
  – Detailed technical specification required to define exactly what is being procured
  – Vendor submits a price proposal based on the specification
  – Lowest bid wins

▸ Two-Step Procurement
  – Specification provides the technical and/or function requirements of the system
  – Vendors submit a technical proposal and are qualified based on their ability to meet the requirements
  – Only qualified vendors submit a cost proposal – Lowest bid wins

▸ Best Value and Negotiated Procurements
  – Specification provides the technical and/or function requirements of the system
  – Vendors submit a technical proposal and cost proposal
  – Proposals are subject to one or more of rounds of negotiation and revision (optional)
  – Final proposals and scored based on a set of evaluation criteria – Highest score wins

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Establishing clear and measurable evaluation criteria is critical to the success of a best value procurement

▸ The goal is to ensure that vendor proposals can be scored using "apple to apples" comparisons

▸ The specification must be detailed in areas that tie to evaluation criteria – open requirements will lead to varied solutions

▸ Providing vendors with detailed pricing forms and proposal format instructions will result in proposals that are easy to evaluate

▸ The use of quantifiable measures is always preferred to ones the are open to judgment or interpretation

An easily justifiable scoring process will greatly limit the risk of a successful protest by a vendor

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The implementation phase is about limiting scope creep while keeping the project moving forward

▸ Even the best laid implementation plan may require modification when it comes time to execute

▸ Remain engaged and make implementation a collaborative process with the vendor

▸ Early and frequent training of staff is critical to build front-line support for the system

▸ Stay focused on the end game and don't get lost in the minutia

▸ Keep the design to the specification whenever possible

A solid specification upfront will prevent the need for change orders during implementation

The fare system will become the new face of the transit agency to customers…

▸ Leverage your customer base for input during implementation through surveys, focus groups, or town hall meetings – **If they don't like it, they won't use it**

▸ Make it easy for customers to get the information and tools (e.g., smart cards) they need to use the system – **If they have to work for it, they won't use it**

▸ Make sure people know that a new system is coming and build excitement with the public and press before launch – **If they don't know about it, they won't use it**

▸ The importance of testing cannot be underestimated – **If it is unreliable or doesn't work, <u>they can't use it</u>**

… do everything possible to make the first impression a good one

Project management doesn't end at system launch

▸ Transition from the development phase to the operations phase can be a challenging process and must be managed by the project team

▸ The active stakeholder group will grow to include all staff that is responsible for overseeing the operation and maintenance of the system

▸ New issues will inevitably come to light as the system is subjected to full use by the public

▸ Management of warranty, punchlist and final acceptance must not be forgotten

▸ Hold project reviews and document lessons learned, so that only "what worked" is repeated on future projects

Thank You!

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