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Transport Infrastructure Ireland

TII Publications



Project Appraisal Guidelines for National Roads Unit 8.0 – Business Case

PE-PAG-02033
March 2021

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TII Authorisation and Contact Details

This document has been authorised by the Director of Professional Services, Transport Infrastructure Ireland. For any further guidance on the TII Publications system, please contact the following:

Contact: Standards and Research Section, Transport Infrastructure Ireland
 Postal Address: Parkgate Business Centre, Parkgate Street, Dublin 8, D08 DK10
 Telephone: +353 1 646 3600
 Email: infoPUBS@tii.ie

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1. Overview

The Business Case document is the primary deliverable summarising the project appraisal process and is developed and updated as the project progresses through its project lifecycle. The Business Case also includes a summary of many other important aspects of the project management and delivery process, alongside the appraisal process. This PAG Unit outlines the structure and detail to be provided in the Business Case document and outlines the project phases for which the Business Case must be prepared. Moreover, this Unit sets out the category of projects for which Business Case documents are required to be prepared.

This PAG Unit has been developed with reference to the “Department of Public Expenditure and Reform (DPER) Public Spending Code (PSC) 2019”, which outlines the approach to the preparation of Business Cases for capital projects.

The lifecycle of a TII National Road capital project is split into 8 defined project phases (Phases 0 – 7) as illustrated in Figure 8.1. The Business Case should be prepared at the following project phases:

- Phase 2 Option Selection - Options Appraisal Report
- Phase 3 Design and Environmental Evaluation - Preliminary Business Case
- Phase 4 Statutory Processes - Preliminary Business Case Update (if necessary)
- Phase 5 Enabling and Procurement - Final Business Case
- Phase 6 Construction & Implementation - Final Business Case Update (if necessary)

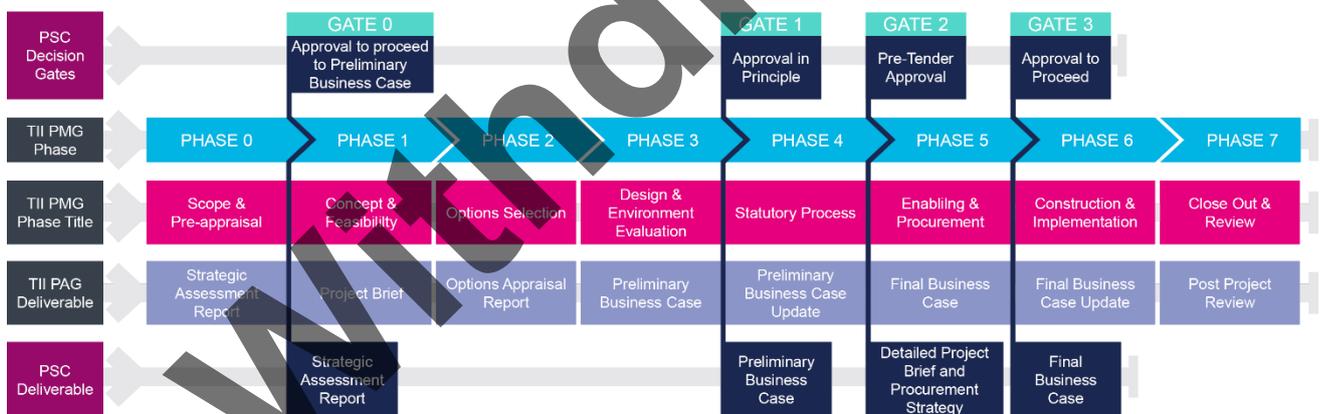


Figure 8.1 TII National Road Project Management Guidelines Project Phases

1.1 Classification of National Road Projects

At present, National Road Capital Expenditure Projects¹ are classified into three main categories under the TII PAG, with each requiring a different and proportionate level of appraisal. The three categories are as follows²:

- Major Project – cost > €20m;
- Minor Project – costing between €5m and €20m; and

¹ For the categorisation of projects capital expenditure costs are inclusive of VAT.

² These classifications may be updated later in 2021 to align with the Department of Transport requirements under the updated CAF.

- Minor Project – costing between €0.5m and €5m.

PAG Unit 2.0: Project Appraisal Deliverables provides full details of the deliverables for each project category.

For Minor Projects formal Business Case documents are not required per se, however, there is a requirement to develop a Project Appraisal Report (PAR) which is in essence a condensed form of the Business Case documents required for Major Projects. Further details in relation to the development of a Project Appraisal Report are provided in PAG Unit 12.0 - Minor Projects (€5m to €20m).

Under this guidance and in accordance with the CAF, Business Case documents are not required for minor projects costing less than €5m, although there is a requirement for a Project Appraisal Balance Sheet (PABS) to be produced. Further details in relation to the PABS for minor projects are provided in PAG Unit 14.0 - Minor Projects (€5m to €20m).

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2. Context

2.1 Options Appraisal Report

The Options Appraisal Report (OAR) is a report that summarises the appraisal process undertaken during Phase 1 (Concept & Feasibility) and Phase 2 (Option Selection). The appraisal process during Phases 1 & 2 establishes whether a sufficient case exists for considering a proposal in more depth, considers and appraises the range of alternatives and options proposed to solve the identified problems and identifies the preferred option to bring forward to Phase 3 (Design & Environmental Evaluation).

The OAR brings together the Project Brief (PB), Transport Modelling Report (TMR), Cost Benefit Analysis (CBA) and Project Appraisal Balance Sheet (PABS) to form a complete statement documenting the rationale behind, and justification for the selection of the preferred option following the completion of the Phase 2 Option Selection process.

The OAR will utilise and build on the work undertaken and included in the Strategic Assessment Report (SAR) developed at Phase 0. The SAR is the first PAG deliverable and also an approval point in the decision making process with approval of the SAR required by the relevant Approving Authority and the Department of Transport (DoT) and in some instances DP&ER before the project can proceed to the next PSC Project Lifecycle stage (i.e. Preliminary Business Case). Further details on the requirements of a SAR are provided in PAG Unit 2.1 – Strategic Assessment Report.

There is no requirement under the PSC Project Lifecycle for the OAR to be reviewed/approved by DoT/DP&ER, however TII will undertake an audit of the OAR for compliance with the TII PAG prior to proceeding to Phase 3.

2.2 Preliminary Business Case

The Preliminary Business Case (PBC) will form an update to the OAR following detailed consideration of scheme planning, design and costs during the Phase 3 Design and Environmental Evaluation process. Again, the PBC brings together the PB, TMR, CBA and PABS to form a complete statement documenting the rationale behind, and justification for the project following the Phase 3 - Design and Environmental Evaluation process.

The PBC enables the Sponsoring Agency to bring together all of the evidence to support their contention that the scheme should be implemented. The PBC will form the basis upon which the Approving Authority makes a decision to progress to the next stage of the project and ultimately sanction its implementation. Therefore the PBC must provide a complete picture of all of the arguments for the scheme together with all the positive and negative impacts of the scheme in question in a non-biased approach.

With reference to Figure 8.1, the Preliminary Business Case is the key deliverable at Gate 1 (Approval in Principle) in the PSC project lifecycle, and the document must be approved by the Approving Authority and DoT/DP&ER³ before the project can formally proceed to Phase 4 (Statutory Process).

The elements of a Preliminary Business Case as set out under the PSC are as follows:

- Confirmation of the strategic relevance of the proposal and detailed specification of the objective of the proposal;
- Description of the short-list of potential options to deliver the objectives set out;

³ For proposals with an estimated capital cost in excess of €100m, the Government is the Approving Authority

- Detailed demand analysis and description of underlying assumptions;
- Options appraisal, including Financial appraisal, Economic appraisal and Sensitivity Analysis;
- Assessment of affordability within existing resources;
- Risk assessment, allowance for optimism bias and full risk management strategy;
- Proposed approach to procurement;
- Proposed approaches to implementation and operation;
- Assessment of delivery risk;
- Plan for monitoring & evaluation including key performance indicators; and
- Recommendation to the Approving Authority.

2.3 Final Business Case

As set out in the PSC the purpose of the Final Business Case is to reassess the assumptions underpinning the Preliminary Business Case and reconsider the findings emerging.

Building upon the Preliminary Business Case the contents of the Final Business Case must be expanded to include the following under the requirement of the PSC:

- Final confirmation of the strategic relevance of the proposal and detailed specification of the objectives of the proposal;
- The Detailed Project Brief⁴ as set out in the Planning and Design Phase and as confirmed by the tendering process;
- Economic and financial appraisal using updated information from the tendering process as necessary;
- Re-examination of affordability within existing resources and with particular reference to the Medium Term Exchequer Capital Envelope for projects funded from Voted expenditure;
- Full risk assessment and consideration of remaining optimism bias;
- Detailed delivery schedule;
- Benefits Realisation Plan; and
- Evaluation Plan.

⁴ The Detailed Project Brief set out in the PSC should not be confused with the TII Project Brief PAG Deliverable. If significant changes occur to the project as part of the Phase 4 Statutory Process after the approval of the Preliminary Business Case (Gate 1 – Approval in Principle) then these changes should be captured and their impacts reflected in the Phase 4 (Statutory Process) PAG Deliverable – Preliminary Business Case Update.

3. Structure and Content of the Business Cases

The Options Appraisal Report, Preliminary Business Case and Final Business Case should be prepared in accordance with the structures outlined in Table 8.1. Table 8.1 shows each of the sections required for an OAR, and the additional sections required for a PBC and FBC. These structures are consistent with the requirements presented in the DPER PSC (2019).

The TII have developed a Business Case Template that is available for download from the "Downloads" section of the TII Publications website under section PE-PAG-02033_Unit 8.

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Table 8.1 Structure of the Options Appraisal Report, Preliminary Business Case and Detailed Business Case Documents

TII PMG Phase	Section		Content
TII Phases 1 & 2 (OAR, PBC & FBC)	Executive Summary		The BC should include an Executive Summary at the outset of the report providing a high level overview of the problem that the project is intending to solve, the options considered, and the estimated impacts.
	1	Introduction	<p>The first section of the BC provides the background to the project, including a high level introduction to the problem that the project is intending to solve, previous relevant studies and their findings, together with the context of the current BC. Information included in the Phase 0 Strategic Assessment Report can be utilised.</p> <p>For the Options Appraisal Report and Preliminary Business Case a statement should be provided in relation to the Phase 0 Strategic Assessment Report for the project and its approval by the Approving Authority to proceed through Gate 0 of the PSC project lifecycle. For the Final Business Case document an additional statement should also be provided in relation to approvals for Gate 1 and Gate 2.</p>
	2	Project Context	<p>Full details on the need for the scheme (i.e. the problem the proposed scheme is intending to solve) should be presented in this section of the BC, including a sound body of analysis to show specific problems that establish a need for an intervention. The current transport-related problems, future transport-related problems and the underlying causes should be assessed to give a detailed presentation of the existing/future conditions. A review of European, national, regional and local policy which is applicable to the project should be provided to inform the need for the scheme.</p> <p>Any high level financial, legal, environmental and administrative constraints should also be identified and discussed in this section. Any previous experience regarding similar projects should also be outlined. A set of project objectives should be defined based on the need for the scheme and the known constraints. The objectives should be clearly defined and independent of each other, and specifically relevant to the current project and should be classed under the CAF appraisal criteria headings (Economy, Safety, Environment, Accessibility & Social Inclusion, Integration and Physical Activity).</p> <p>The Key Performance Indicators against which the project can be evaluated and monitored both qualitatively and quantitatively need to be included.</p> <p>This section of the Business Case will evolve as the project progress and new/additional information becomes available. A programme logic model (diagram) showing the linkages between the project inputs, activities, outputs and outcomes is required.</p>

TII PMG Phase	Section		Content
			Information included in the Phase 0 Strategic Assessment Report can be utilised to inform this section of the BC. Further details are provided in PAG Unit 3.0
	3	Analysis Tools	<p>A description of the analysis tools used in support of the preparation of the BC should be provided. Such tools may include transport models, safety models, economic models, emissions models and accessibility models. A summary of the development and validation of the models should be provided, with reference to technical modelling reports as appropriate.</p> <p>Further details are provided in PAG Unit 5.0.</p>
	4	Consideration of Alternatives & Options	<p>A description of the structured process undertaken to identify the preferred option for the project should be provided in this section and should cover the following:</p> <ul style="list-style-type: none"> • Identification of a long list of feasible alternatives/options (Phase 0) • Consideration of Alternatives (across all modes); • Consideration of Options (single mode); • Narrowing of Options (Phase 2 Option Selection Stage 1); and • Appraisal of Options (Phase 2 Option Selection Stage 2). <p>Reference should be made to PAG Unit 4.0: Consideration of Alternatives & Options for guidance. A Multi-Criteria Analysis (MCA) approach should be adopted as per the guidance set out in PAG Unit 7.0: Multi-Criteria Analysis.</p> <p>Details of the cost of each option at Stage 2 should be provided in the BC alongside expenditure profiles and an assessment of affordability/funding sources.</p> <p>Any incremental analysis undertaken as part of the appraisal of options should be provided.</p>
	5	The Preferred Option	Introduction of the preferred option emerging from the Phase 2 Option Selection process. This section should provide information on the design standards used, and present demand projections for the preferred option. The chapter should also set out the detailed composition of scheme costs for the preferred option.

TII PMG Phase	Section		Content
			The scheme costs and assessment of affordability/funding sources should be reviewed/updated at each project phase.
TII Phase 3-6 (PBC & FBC)	6	Detailed Appraisal	An overview of the detailed appraisal of the preferred scheme, including the following: <ul style="list-style-type: none"> • Financial Appraisal • Economic Appraisal • Sensitivity Analysis • Project Appraisal Balance Sheet (PABS)
	7	Risk Assessment	Identification of the key risks associated with the project that require consideration in any decision making process, and in subsequent stages of the project. Risks should include cost risks, programme risks, funding risks, affordability risks and acceptability risks. A risk mitigation strategy should be provided which outlines how risks were identified, evaluated, monitored and tracked. The FBC should include a detailed Risk Management Strategy.
	8	Procurement	A discussion on procurement strategies or the preferred procurement strategy if such has been decided should be included in the PBC.
	9	Implementation Proposals	Any relevant proposals for constructing/implementing the project (e.g. phasing) and the associated timescales should be provided in the PBC and FBC.
	10	Monitoring & Evaluation Plan	A monitoring and evaluation plan is a requirement within the PBC. This plan ensures that the project can be evaluated robustly against its Key Performance Indicators either at the end of the project and/or at the pre-selected time in the future. The monitoring and evaluation plan should be updated as part of the FBC.
	11	Conclusions	A brief conclusion summarising the BC process, its current stage and its compliance with PSC should be included.

The Business Case should be supported by and make reference to the following documents which are to be included as appendices to the Business Case document:

- Appendix A – Project Brief (PB);
- Appendix B – Transport Modelling Report (TMR);
- Appendix C – Cost Benefit Analysis (CBA) Report; and
- Appendix D – Project Appraisal Balance Sheet (PABS).

The appendices for the Business Case should only include the current Phase PAG deliverables relevant to the current Phase of the Business Case. The Business Case document should provide a summary of the key points of the PB, TMR, CBA and PABS and can reference specific sections of these documents where relevant.

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 Ionad Ghnó Gheata na Páirce,
Stráid Gheata na Páirce,
Baile Átha Cliath 8, D08 DK10, Éire

 www.tii.ie

 +353 (01) 646 3600

 Parkgate Business Centre,
Parkgate Street,
Dublin 8, D08 DK10, Ireland

 info@tii.ie

 +353 (01) 646 3601