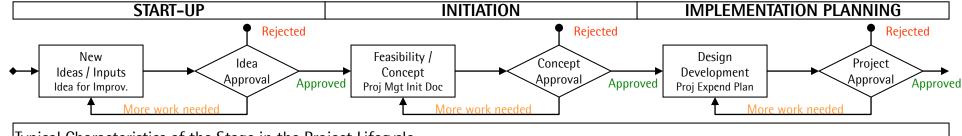
Project Lifecycle - Commercial Framework 1 - to Project Approval



Typical Characteristics of the Stage in the Project Lifecycle

- n Developed by the individual or improvement team
- n Resp: idea generator
- n High / Medium / Low quantification
- n Accuracy gut feel
- n Man-days of effort

- n Approved by local middle management
- n Resp: line manager
- n Project Manager designate nominated
- n Coarse filter, quick decision
- n Held monthly

- discipline team (part time)
- n Resp: Project Mgr designate n Order of Magnitude
- quantification
- n Accuracy ±50%
- n Man-weeks of effort
- n Developed by in-house multi- n Approved by local senior site n Developed by project team & management
 - n Resp: Site Director
 - n Approval to appoint Design Contractor/design pre-spend
 - n Business case based decision
 - n Held quarterly

- design contractor (if applic.)
- n Resp: Project Manager
- n Historical / budget pricing based quantification n Accuracy ±10 to 20%
- n Man-months of effort
- Approved by Site / Regional / Central Executive Mgmt
- n Resp: Engineering Director
- n Approval for Design (AFD)
- n Full economic based decision with risk analysis
- n Every six months or annually

Typical Associated Deliverables / Documentation

- n Idea for Improvement form
- n Approved Idea for Improvement form
- n Idea for Improvement register n Statement of requirements
- n Publicised reward for good ideas (incentive)
- n Subsequent approval route / level
- n Draft equipment list (major process equipment only)
- n Capacity calculations
- n Contracting / commercial strategy incl. Supplier dev.
- n Business case including plans, guestimation of capital cost, revenue / operating cost, and income assessment for each potential option (incl. 'do-nothing' scenario)
- n Signed off business case for selected option
- n Signed off statement of requirements (SOR)
- n Approved commercial strategy
- n Completed concept approval checklist
- n Approved supplier development requirements

- n Complete equipment list n Appropriate one-line diagrams & AFD package
- n Bottom-up capital cost estimate (incl. RFI back-up)
- n Full Procurement Strategy
- n Detailed plan & CTR (cost, time & resource) sheet/s
- n Risk management strategy
- n Fully completed economic assessment (incl. cash flow)
- n Communication plan

- n Signed off Project Expenditure Plan (S&OP, Fintec. etc)
- n Signed off AFD package
- n Documented technical / commercial peer review findings
- n Basis for measuring project performance against objectives
- n Approved Procurement Strategy (& initial MTO)

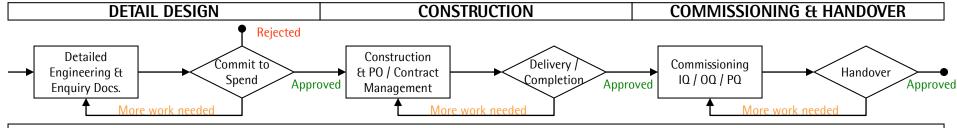
Potential Supporting Commercial Tools & Techniques

- n Idea generation (e.g. brainstorming) guidelines
- n Opportunity positioning quidelines (e.g. Hi-Lo matrices)
- n Idea for Improvement process quidelines
- Opportunity prioritisation (and filtering) guidelines
- n Incentive / reward guidelines
- n Idea for Improvement system
- n Order of Magnitude estimating guidelines
- n Business case guidelines
- Statement of Requirement (SOR) guidelines
- n Economic / TAC assessment quidelines
- n Decision analysis guidelines
- n Commercial strategy template & guidelines

- n Concept approval criteria quidelines
- n Concept approval checklist
- n AFD package guidelines (Eng) n Estimating guidelines
- n Sourcing Group Strategy auidelines*
- n Supplier Management & Development guidelines* (incl RFI process)
- n Contract type selection quidelines (capital)
- n Requisition planning quidelines (capital)
- n Risk assessment guidelines

- Peer Review process quidelines
- n Project approval checklist and auidelines
- n Project performance measurement and assessment quidelines

Project Lifecycle – Commercial Framework 2 – to Project Handover



Typical Characteristics of the Stage in the Project Lifecycle

- n Developed by project team & design contractor (if applic.)
- n Resp: Project Manager
- n Post enquiry / negotiation based pricing
- n Accuracy ± 5 to $\pm 0\%$
- n Man-months / years of effort n As required by project
- n As per Project Approval plus major PO / contract sign-off
- n Resp: per Project Approval
- n Approval for Construction n Detailed cash flow with Risk
- Management plans
- n Managed by project team & design/construct contractors
- n Resp: Project Manager
- n Detailed take-off based costing
- n Accuracy ±1% to ±3%
- n Man-months / years of effort n As required by project
- n Approved by Project Management
- n Resp: Project Manager
- n Approval of stage payments n Completion of construction documentation & punch lists
- n Managed by project / commissioning management
- n Resp: Project Manager
- n No substantial costing activities n As costed
- n Man-months of effort
- n Approved by Site Management
- n Resp: Site Manager n Handover sign-off
- n Handover of remaining punch list items
- n As required by project

Typical Associated Deliverables / Documentation

- n Approved for Construction [AFC] package (with Holds)
- n Full requisition schedule
- n Detailed cash flow (actual plus commitments)
- n Purchase orders ready to commit (with intermediate Material Take-off [MTO])
- n Detailed plans through to handover
- n Detailed estimate of revenue costs

- n Signed off AFC package
- n Approved major purchase orders and contracts
- n Finance approved cash flow requirements n Commitment to required
- resources through to handover
- n Production endorsement of revenue costs

- n As-built drawings and
- n Order completion punch lists
- n Actual spend and reconciliation
- n Operating manuals, final drawings, required QA certification
- Completion and commissioning plans
- n Transfer to asset / maint. management systems

- n Signed of As-built package
- detailed operating procedures n Approved final / stage payments
 - n Approval of agreed variation orders with suppliers
 - n Mobilisation of production staff to support commissioning activities
 - n Submission and approval of any budget variations

- n Completed QA / Commissioning check-lists
- n Commissioning punch lists n Production budget planning
- inputs Nation Validation documentation and signed of completion certificates
- n Production start-up and servicing plans

- n Handover acceptance certificate
- n Approval to complete all outstanding payments
- n Agreement to start production
- n Agreement to release final members of project team
- n Close-out of project

Potential Supporting Commercial Tools & Techniques

- n Supplier Evaluation quidelines (capital specific)
- n Cost control guidelines
- n Model Terms of Contract
- n Supplier Specification Management guidelines*
- n Supply Planning & Control quidelines*
- n Life-cycle costing guidelines (at a detailed level)

- n Enquiry / purchase order checklists
- n Vendor data requirements quidelines (capital specific)
- n Supply of Materials & Services guidelines*
- n Change order / variation management guidelines (capital specific)
- n Asset disposal guidelines
- n Supplier performance management guidelines
- n Guidelines on payment retention (or incentive to complete)
- n Lessons Learnt capture quidelines
- n Project close-out guidelines