

# 19 CLOSEOUT

## 19.1 OVERVIEW

Closeout provides information about project completion, including transition, physical closeout, and financial closeout.

The DOE project transition, closeout, and termination processes should be applied to all projects. The processes described can apply to completed projects, or to a portion of a project that functions independently of other portions of the project. Partial closure of a project can be appropriate and can help the Department maintain more accurate project, financial, and property records.

Closing the project is a time of emotional—and user—satisfaction. However, even when a project is well done, one must recognize that it is really not quite finished. Project closure is the time to take the necessary steps to ensure customer, user, team members and contractors are treated properly so as to close the loop on all loose ends on the project.

Closure can be a quick or protracted time for a project. In the event the project manager is reassigned prior to final project completion, a project closure manager should be designated. If not included in the PEP, a separate plan for demobilizing the work force and dispositioning the physical assets should be prepared and executed. Turnover to the user should be documented and appropriately signed off.

The project manager should maintain the records and correspondence file for project documentation until the contract is officially closed or as long as deemed necessary by project requirements. This system of records (see Practice 18, Records) must be adequate to allow a competent person to respond to claims even though they were not part of the original project team. Closure is an area of concern and must receive sufficient attention to assure it is done in a timely and complete manner. Particular attention should be given to completion reports that provided the basis for fee performance or payments. If deemed appropriate, a third party could provide a review and assessment of the adequacy of closure records prior to demobilizing the project team.

## 19.2 TRANSITION PLANNING

Moving a project from the execution phase to user acceptance or long-term care status requires that technical and administrative matters be addressed during earlier phases of the project. As early in the execution phase as feasible, the project manager should initiate planning for and development of the documentation necessary for transitioning the project to the user. Planning could include development of operations and maintenance manuals and procedures, preparation of as-built drawings, and the procurement of materials required for initial operation. Planning should be developed in conjunction with the user to encourage complete mutual understanding and agreement. Normally, the project transition plan is prepared by the contractor under the guidance of DOE. Depending on the type of project and the end use of the project deliverables, a transition plan typically:

- ▶ Specific roles and responsibilities of DOE, the contractor, and the user. Responsibilities will vary depending on the type of project, but can typically include the following considerations:
  - Operations startup safety
  - Training of user personnel
  - Site support: utilities, security, other support
  - Sustained engineering support
  - Spare parts/components inventory
  - Operational testing
  - Specialized vendor support for unique equipment operations requirements
  - Authority for releasing contractors
- ▶ A resource plan addressing the phaseout of personnel whose expertise is not required for transition. However, consideration should be given to obtaining or retaining specialized skills needed for transition, such as startup personnel.
- ▶ A comprehensive transition schedule
- ▶ Turnover and acceptance procedures
- ▶ A list of permits or licenses required for facility use

- ▶ Operational testing, which can include:
  - identification of functional or integrated systems tests
  - identification and training of test teams
  - development of accept/reject test criteria
  - a method for documenting test results and resolving failed components or systems.

### 19.3 PROJECT TURNOVER / ACCEPTANCE

For some projects, an operations phase follows the completion of the project. When, following completion of the construction phase, the project begins transition activities leading to operation, the project manager should maintain responsibility for project functions so that they can address issues that arise concerning the project. The project manager should also work closely with user organizations to complete acceptance testing and startup in accordance with planning documentation developed during the project's execution phase. As previously planned, either the user or project organization will be responsible for performing tests and evaluations to ensure that the project can be safely operated as designed and built.

During transition, the user organization will normally accept beneficial occupancy of the facility and assume ownership of project documentation. Typically, the documentation transferred from the project organization to the user organization would include

- ▶ Environmental and safety
- ▶ Design basis
- ▶ Drawings and specification, including as-built
- ▶ Configuration management
- ▶ Equipment and operating manuals, project records, and other relevant information.

The user manager or project manager would normally prepare and submit acceptance completion documentation to support CD-4, which occurs before operations begin or decommissioning/remediation phases are complete (see Practice 4, Project Execution Plan). This documentation indicates that technical performance has been demonstrated as acceptable and that no further transition activities are

necessary. The acceptance phase concludes with documented acceptance of the project by the user organization. Figure 19-1 depicts the sequence of primary activities/events necessary for project closure.

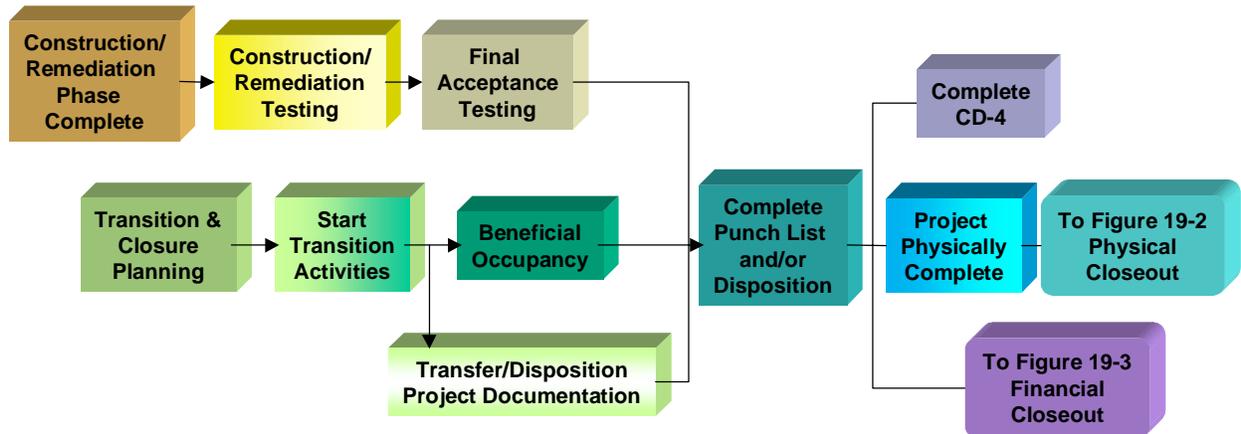


Figure 19-1. Overall Project Transition and Closure Flow

## 19.4 PROJECT CLOSEOUT

A project is ready for closeout once it has successfully made the transition from the project organization and has been accepted by the user organization.

Project closeout begins at beneficial occupancy or project termination, and is complete after all financial closeout activities are complete. Typically, the contractor will be allowed up to six months on smaller projects and twelve months on larger projects to prepare the Final Cost Report following project completion, CD-4. The Final Cost Report will include total project costs-to-date and estimates for any remaining work that may still be outstanding. The Final Cost Report should also include accruals, and estimates for outstanding claims, if applicable. Timely submission of this report will facilitate removal of completed projects from the financial reporting system. Obligations other than those identified in the Final Cost Report are de-obligated and returned to the chief financial officer.

Project closeout occurs in two primary steps: physical and financial, in that order.

## 19.5 PHYSICAL CLOSEOUT

Physical project closeout primarily consists of activities remaining after the user accepts the project. The project manager completes post-acceptance activities and requests project closure approval from DOE. Activities associated with physical project closeout are as follows:

1. When completion criteria are established, preferably in the project execution plan, the project manager must review each criterion and provide a written determination as to satisfactory completion.
2. All turnover punch list items must be reviewed to ensure they have been completed to the satisfaction of the project and the user organization. Any uncompleted punch list items must receive the project manager's immediate attention to facilitate closure. Punch list closure will, in most circumstances, hasten the release of the construction contractor.
3. Excess material and equipment must be identified, retrieved from subcontractors, and dispositioned in accordance with DOE property disposition regulations. Disposing of excess material or equipment can also entail adjustments to capital equipment accounts.
4. All purchase orders should be closed. If a purchase order cannot be closed, the project manager should open a single account to deal with residual outstanding obligations. Outstanding obligations should be included in the Final Cost report.
5. A Project Closure Report (Table 19-1) must be prepared.
6. An Occupancy Checklist (Table 19-2) should be prepared and used to accelerate the transition process.
7. All remaining project control accounts, except those for outstanding obligations, should be closed to assure additional charges are not accepted.
8. The project lessons learned report must be completed and provided to the DOE.

The project manager should receive the request for project closure approval with necessary supporting documentation. At that time, the project manager should determine (and may conduct an independent inquiry) that all actions have been satisfactorily completed.

**Table 19-2. Project Closure Report**

**PROJECT CLOSURE REPORT**

<b>Project Title:</b>	<b>Contractor Reference Number:</b>	<b>DOE Reference Number:</b>
<b>Project Purpose and Scope:</b>		
<b>Project Original Baseline Plan</b>	<b>Completion Cost</b>	<b>Completion Date</b>
<b>Project Final Completion Baseline</b>		
<b>Discussion on Issues/Costs/Technical:</b>		
<b>Key Learning Points and Recommendations:</b>		
<b>Actions Assigned, if any:</b>		
<b>Project Manager:</b> _____		
<b>Report Review, if any</b>		
	<b>Date</b>	<b>Signature</b>

**Table 19-3. Occupancy Checklist**

Goal: Ensure that at least the minimum building, life safety, and security conditions exist prior to moving personnel into a new building and to make an informed management decision on whether or not to occupy.										
Priority Level 1 = Must be completed prior to occupying the building for life safety, fire protection, security, and other mandatory ES&H requirements.										
Priority Level 2 = Must be completed prior to the customer commencing operations.										
Priority Level 3 = These items can be completed after the building is occupied and after the customer is operating.										
Instructions: The responsible individual will date and initial when each item is functional. Outstanding punchlist items may be corrected later.										
Item	System Support	System Description	Priority	Example Concerns	Architectural Inspector	Mechanical Inspector	Electrical Inspector	Customer Rep	Notification Contact	Issues/Concerns and Associated Risk (for assessment)
1	Building	Building Structure	1A	Any structural concerns?	X				CME	
2	Building	Emergency Egress	1A	Paving, concrete walkways in a place for exterior egress routes?	X				Incident Commander	
3	Building	Fire Detection and Alarm	1A	Building fire detection and alarm system installed and operational?			X		Fire Protection Engineer	
4	Building	Fire Response Access	1A	Fire fighting systems in place, including connections, hydrants, and standpipes?		X			Incident Commander	
5	Building	Lighting	1A	Emergency Lighting System installed and operational? Inverters purchased?			X		CME	
6	Building	Lighting	1A	Interior lights operational?			X		CME	
7	Building	Power Distribution	1A	Building power installed, tested and operational?			X		CME	
8	Building	Access Control	1B	Exterior doors rekeyed?	X				Security	
9	Building	Domestic Water	1B	Domestic water system installed, tested, and operational? Lines sanitized?		X			CME	
10	Building	Fencing, Gates	1B	Required security fences, gate in place to support customer operations?	X				Security	
11	Building	Fire Protection	1B	Fire department notified that new building is on system?		X			Incident Commander	
12	Building	Fire Protection	1B	Dedicated telephone line installed, tested and operational?			X		Fire Protection Engineer	
13	Building	Fire Protection	1B	Building fire suppressions system installed and operational?		X			Fire Protection Engineer	
14	Building	Restrooms	1B	Restrooms stocked with supplies and services scheduled to support occupancy?	X				Custodial Services	
15	Building	Sanitary Sewer	1B	Sanitary sewer system installed, tested and operational?		X			CME	
16	Building	Emergency Response	1C	Vehicle access routes available to support response of emergency vehicles?	X				Incident Commander	
17	Building	Fire Protection	1C	Fire extinguishers in place?		X			Incident Commander	
18	Building	Lighting	1C	Exterior lights and parking light operational?			X		CME	
19	Building	Compressed Air	2A	HVAC pneumatic control system installed, tested, and operational?		X			CME	
20	Building	Exhaust System	2A	Fans operational and filters (HEPA) in place?		X			CME	

Once the physical project completion request is approved, the project may begin financial closeout. Figure 19-2 depicts the physical closeout process.

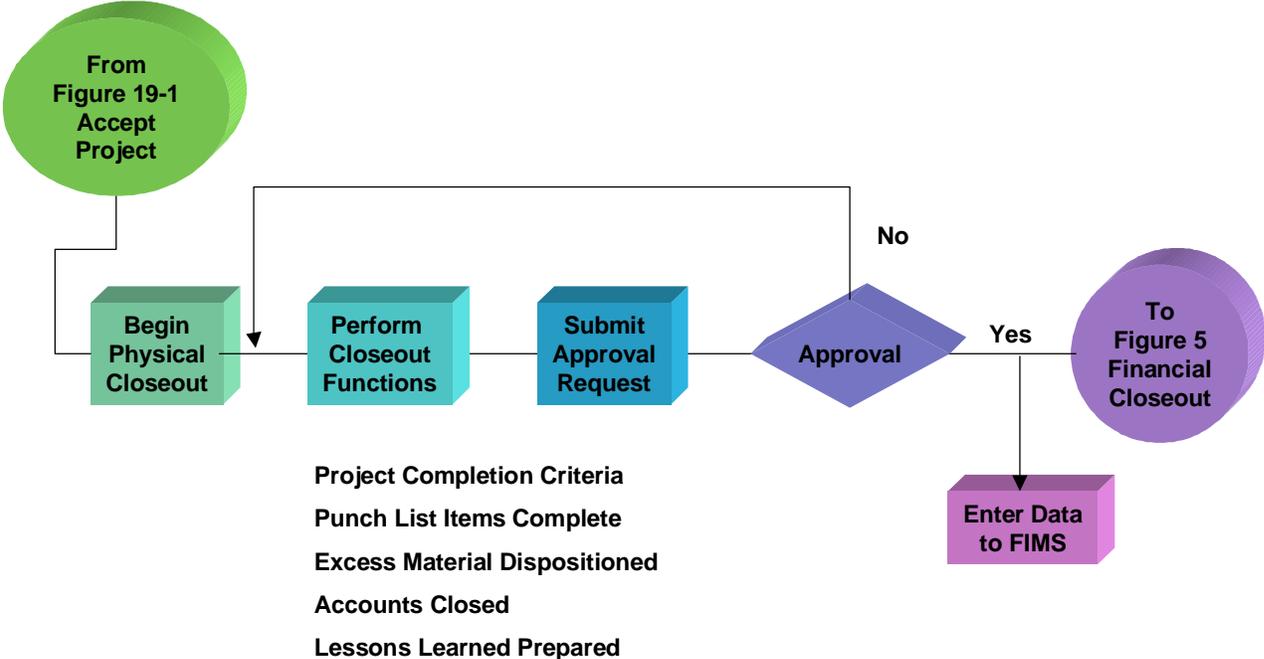


Figure 19-2. Physical Closeout Logic Flow

### 19.6 FINANCIAL CLOSEOUT

Once the user organization has beneficially occupied a facility, the project organization may begin preparing for financial closeout (Figure 19-3.) Although financial closeout and physical closeout can occur in parallel, financial closeout is finalized only after a successful physical closeout is complete. The timely closing of a project is of paramount interest both to Congress and the Department, each of which has an objective to identify unspent balances and deobligate them for use elsewhere as needed. As described in this section, financial closeout follows two parallel paths that help meet this objective: adjusting the Department’s construction and capital asset accounts and preparing the project Final Cost Report (Figure 19-3).

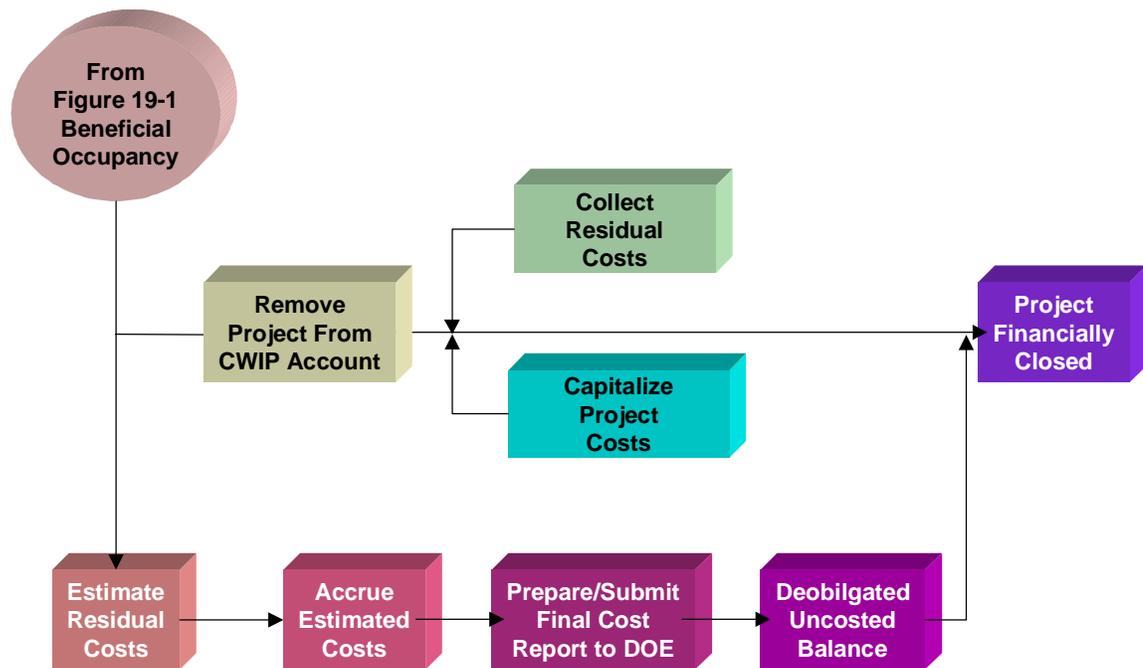


Figure 19-3. Financial Closeout Logic Flow

The DOE uses the Final Cost Report to determine if unspent balances remain. Remaining balances are deobligated through the approved funding program and reported to Headquarters, which ensures a source of funds if the project must be reopened later.

The project manager prepares the Final Cost Report for a project. Preparation of this report can begin once the user organization takes beneficial occupancy. Normally, work on a facility is not completed at beneficial occupancy and the managing contractor should estimate the costs required to complete the facility. Estimating and potentially accruing these residuals costs, rather than waiting until all costs have been realized, is necessary to expedite the deobligation of funds. Costs normally estimated include the following:

- ▶ Open purchase orders awaiting residual equipment, initial spares, or final vendor/contractor invoicing
- ▶ Construction services necessary to complete any remaining punch list items
- ▶ Outstanding claims
- ▶ Administrative and management labor to support and process closeout activities

Example Final Cost Report, Page 1

UNITED STATES DEPARTMENT OF ENERGY ALBUQUERQUE OPERATIONS OFFICE		Sheet No. <u>1 of 3</u>	
FINAL COST REPORT For: <u>SANDIA NATIONAL LABORATORIES</u> Budget Project No. <u>39DP01000GPD101000000</u>			
Construction Contractor _____		Directives No. _____	
Architect – Engineer _____		Date Prepared: _____	
ALLOCABLE COSTS		SYMMARY OF PROJECT CHARGES	WORK BREAKDOWN STRUCTURE (WBS) SUMMARY
Allocable Element	Dollar Value		WBS Element
ED&I: Design Building Occupancy Improv'mts to Land Utilities Const Mgmt/Insp PROJECT MGMT: Project Mgmt Documentation		ASSET TYPE COSTS _____  GOVERNMENT FURNISHED MATERIAL _____  OTHER COSTS _____  ALLOCABLE COSTS _____	AUTHORIZED FUNDS _____  WBS COSTS: ED&I Construction Equipment Management Contingency TOTAL COSTS _____
<b>TOTAL</b>	<b>\$0.00</b>		<b>0.00</b>
		<b>TOTAL</b>	<b>\$0.00</b>
			<b>0.00</b>

Figure 19-6. Example Final Cost Report, Page 1

Example Final Cost Report, Page 2

Sheet No. <u>2 of 3</u>								
UNITED STATES DEPARTMENT OF ENERGY ALBUQUERQUE OPERATIONS OFFICE								
FINAL COST REPORT For: <u>SANDIA NATIONAL LABORATORIES</u> Budget Project No. <u>39DP01000GPD101000000</u>								
1	2	3	4	5	6	7	8	9
Asset Type Number	Description of Asset Types	Quantity	Unit	Asset Type Costs	GFM	Other Costs	Allocable Costs	Total
	<b>INTERIOR</b>							
	<u><b>Building &amp; Structures</b></u>							
501	Owned Buildings							\$0.00
550	Other Structures							\$0.00
	<u><b>Equipment</b></u>							
710	Heavy Mobile Equipment							\$0.00
715	Hospital & Medical Equip							\$0.00
720	Laboratory Equipment							\$0.00
725	Motor Vehicles & Aircraft							\$0.00
730	Office Furniture and Equip							\$0.00
735	Process Equip Personal Prop							\$0.00
740	Railroad Rolling Stock							\$0.00
745	Reactor/Accelerators (Personal)							\$0.00
750	Security & Protection Equip							\$0.00
755	Shop Equipment							\$0.00
770	ADP Equipment							\$0.00
775	ADP Software							\$0.00
780	Portable Communication Electronic Equip							\$0.00
799	Miscellaneous Equip							\$0.00
803	Improvement to Property of Others – Equipment							\$0.00

Figure 19-6. Example Final Cost Report, Page 2

Example Final Cost Report, Page 3

Sheet No. 3 of 3

UNITED STATES  
DEPARTMENT OF ENERGY  
ALBUQUERQUE OPERATIONS OFFICE

FINAL COST REPORT  
For: SANDIA NATIONAL LABORATORIES  
Budget Project No. 39DP01000GPD101000000

1	2	3	4	5	6	7	8	9
Asset Type Number	Description of Asset Types	Quantity	Unit	Asset Type Costs	GFM	Other Costs	Allocable Costs	Total
	<b>EXTERIOR</b>							
	<u>Utility Systems</u>							
610	Communications Sytems							\$0.00
615	Electric Generating Trans & Dist Systems							\$0.00
620	Fire Alarm Systems							\$0.00
625	Gas Production, Trans & Dist. Systems							\$0.00
630	Irrigation Systems							\$0.00
635	Railroad Systems							\$0.00
640	Sewage Systems							\$0.00
645	Steam Generation & Dis Systems							\$0.00
650	Water Supply, Pump & Dist System							\$0.00
670	Process Equipment							\$0.00
	<u>Improvements to Land:</u>							
401	Land							\$0.00
410	Land Rights							\$0.00
430	Minerals							\$0.00
460	Site Prep., Grading & Landscaping							\$0.00
470	Roads, Walks, and Paved Areas							\$0.00
480	Fences and Guard Towers							\$0.00
490	Other Improvements to Land							\$0.00
	<u>Other Asset Types</u>							
800	Improvements to Property of Others							\$0.00
900	Unclassified Plant & Equipment							\$0.00
999	Other							\$0.00
+	Total			\$0.00	\$0.00	\$0.00	\$0.00	\$0.00

Figure 19-6. Example Final Cost Report, Page 3

Typically, the Final Cost Report contains the following information:

- ▶ Project number, title, and budget and reporting classification.
- ▶ Amount of original deobligation and subsequent obligations or deobligations.
- ▶ Cost summary organized in the same categories as the original project data sheet.
- ▶ Capital investment from the project and the value of Plant and Capital Equipment adjustments.

Once the Final Cost Report has been prepared, estimated residual costs can be accrued in the site accounting system. Accruing the estimated residual project costs will facilitate an uncosted obligations balance of zero for the Prior Year Construction Projects Report (mandated by the House of Representatives in the Energy and Water Development Appropriations Bill of 1995.) Reserve accounts can be established within the site accounting system to collect estimated project costs, and residual balances (differences between accruals and actuals) can be liquidated in accordance with established site accounting practices.

In parallel with Final Cost Report activities, the project can be removed from the Department's Construction Work in Progress (CWIP) account and placed in the appropriate capital assets account. Removing a project or portions of a project from the CWIP account once beneficial occupancy has occurred complies with DOE O 534.1, ACCOUNTING. Removing the project from the CWIP account also facilitates financial closeout to support input to the annual Prior Year Construction Projects Report. The project can be considered financially closed once it has been removed from the CWIP account and the project's unobligated balance equals zero.