

# Part D

## Compliance Procedures and Safeguards

<b>A</b>	<b>Introduction to the Shire Valley Transformation Program</b> Program Overview Financial Summary Results Framework
<b>B</b>	<b>Institutional Arrangements</b> Government Organization Roles Structure of the Project Management Team Stakeholder Identification and Processes
<b>C1</b>	<b>Irrigation Service Provision</b> Infrastructure Development Irrigation Management, Operation and Maintenance
<b>C2</b>	<b>Land Tenure and Natural Resource Management Support</b> Preparing Local Governance for Securing Land Tenure in the Project area Natural Resource Management
<b>C3</b>	<b>Agriculture Development and Commercialisation</b> Scope of activities; SOCFEs establishment; Technical Design Choice; Agricultural Development; Integration with other agricultural development initiatives; Summary of Agricultural Development and Commercialisation Technical Assistance ToRs
<b>C4</b>	<b>Project Management and Coordination</b> Project Management Arrangements Monitoring and Communication Strategy
<b>D</b>	<b>Compliance Procedure and Safeguards</b> Financial Management Procurement Social and Environmental safeguards Grievance Redress Mechanism

# Part D

## Contents

<b>1.</b>	<b>Financial Management &amp; Reporting.....</b>	<b>4</b>
1.1	Financial Management.....	4
1.2	Financial Management Arrangements .....	9
	Budgeting .....	9
	Accounting .....	9
	Internal auditing .....	9
	Internal control systems .....	9
	Financial reporting.....	9
	Auditing.....	10
	Fraud and corruption.....	10
	Financial Management Action Plan .....	11
	Implementation Support Plan .....	12
	Disbursements.....	12
<b>2.</b>	<b>Procurement.....</b>	<b>14</b>
2.1	Legal Aspects and Procurement Practices .....	14
2.2	Implementation Arrangements.....	14
	Capacity Assessment of MoAIWD .....	15
2.3	Selection of Consultants.....	17
2.4	Procurement of Works, Goods and Non-Consultant Services .....	18
	Direct Contracting.....	18
	Shopping.....	18
	National Competitive Bidding (NCB).....	18
	Force Account.....	19
	Framework Agreements (FAs).....	19
	Use of Government institutions and parastatals.....	20
	Other conditions.....	20
	Prior review and associated thresholds.....	20
	Risk of fraud and corruption .....	21

Procurement plan .....	21
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### **3. Social & Environmental Safeguards ..... 22**

3.1 Overview.....	22
Poverty and social inclusion.....	22
Citizen engagement.....	23
Gender and youth.....	23
3.2 Social Safeguards .....	25
Resettlement Policy Framework (RPF).....	25
Land consolidation.....	27
Labor influx .....	28
3.3 Environmental Safeguards.....	28
Protecting Lake Malawi from invasive fish species.....	30
Fish barrier system.....	30
Majete Wildlife Reserve (MWR).....	31
Lengwe National Park (LNP) .....	32
Mitigating project-induced pressures upon Protected Areas .....	32
Elephant Marsh .....	33
Irrigation area set-aside lands.....	34
Pest Management Plan (PMP).....	34
Public health measures.....	35
Canal design and construction .....	35
Environmental and social rules for contractors.....	36
3.4 Additional Safeguards Policies.....	37
Trans-boundary water.....	37
Dam safety .....	37

### **4. Grievance Redress Mechanism ..... 38**

4.1 Project-level Grievance Redress Mechanism.....	38
4.2 World Bank Grievance Redress.....	39

# 1. Financial Management & Reporting

## 1.1 Financial Management

The Ministry of Agriculture, Irrigation and Water Development (MOAIWD) will be responsible for the financial management of the Project. In compliance with WB guidelines and directives, a financial management assessment of MOAIWD was undertaken. The FM arrangements of the Ministry for the purposes of project management were assessed as **moderately unsatisfactory** and **carrying substantial risk**, and specific measures recommended to mitigate the weaknesses identified; these are already in place for PPA management (Table D-1).

**Table D-1: Main financial management risks and mitigation measures**

<b>Risks and Mitigation Measures</b>	
<b>Risk:</b>	The Ministry has no appropriate accounting system for project accounting and reporting. The IFMIS and its control environment are weak, with almost no remedies for non-compliance.
<b>1</b>	The Project will acquire and install an accounting software program for transaction processing and reporting.
<b>Risk:</b>	Weak audit committees and ineffective internal audit functions.
<b>2</b>	<ul style="list-style-type: none"> <li>The Project will be visited at least twice a year for implementation support that will include dealing with FM issues.</li> <li>The Project will submit unaudited interim financial reports to be reviewed and validated by the World Bank FM team.</li> <li>Transactions will be internally audited at least twice a year.</li> <li>The Ministry's audit committee is to be strengthened and functioning.</li> <li>The projects financial statements will be externally audited by the National Audit Office or private auditors, under TOR to be agreed on with the World Bank.</li> </ul>

<b>Risk:</b>	Mechanisms to deter fraud and corruption are weak. There is a risk that Community Driven Development (CDD) activities and major irrigation contracts could be subject to elite capture.
<b>3</b>	<p>Collaborate with the Anti-Corruption Bureau to incorporate corruption prevention and reporting mechanisms. These should include:</p> <ul style="list-style-type: none"> <li>• social accountability mechanisms covering public reporting;</li> <li>• the use of community volunteers and civil society organizations in social audits; and</li> <li>• disclosure of project information.</li> </ul>
<b>Risk:</b>	<p>The ministry uses the consolidated government bank account for project funds. Bank reconciliations are not done on time and reconciling items are not timeously resolved, so accounting and reporting is either inaccurate and/or incomplete.</p> <p>Delays in funds flow from the Ministry of Finance to MOAIWD lead to project implementation delays.</p>
<b>4</b>	The project must have exclusive US Dollar and Kwacha accounts at a commercial bank acceptable to the World Bank;
<b>Risk:</b>	There is a lack of dedicated FM staff working on project accounting and reporting, resulting in delays which affect the timeliness of drawdowns on credits and grants.
<b>5</b>	The proposed project must have an independent PMT which includes dedicated FM staff responsible for Project accounting and reporting. The staff should be trained in FM and disbursement for World Bank-funded projects.

Once these measures have been implemented the arrangements will meet the WBs minimum requirement for FM, albeit with substantial residual risk. The detailed risks and mitigation measures appropriate to various levels of the project are listed in Table D-2.

Table D-2: Detailed risks and mitigation measures at various project levels

<b>FINANCIAL MANAGEMENT RISKS &amp; MITIGATION MEASURES</b>			
<b>Identified risks</b>	<b>Initial Risk</b>	<b>Mitigation measures</b>	<b>Residual Risk</b>
<b>Country Level</b>			
<ul style="list-style-type: none"> <li>Lack of accountability; poor enforcement &amp; compliance with existing regulations &amp; procedures; limited implementation of auditors' recommendations; the lack of sanctions for offenders.</li> <li>Weak accounting system, including poor control environment of automated IFMIS, affecting the quality of financial statements produced by Ministries' implementing projects.</li> <li>Weak audit committees in Government Ministries with limited follow-up on issues raised in project audit reports.</li> <li>Weak legislative scrutiny of external audit reports.</li> <li>Problem of timeliness and regularity of various accounts reconciliations, including bank reconciliations.</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>To address frauds committed in IFMIS, the cooperating partners are working with Government to plug the gaps in the system and strengthen the functional and system controls. The government has taken disciplinary and legal actions against some of the perpetrators. Forensic audits have been conducted and recommendations from these audits (including disciplinary measures) will improve the control environment, albeit not in the short-term.</li> <li>The government, supported by cooperating partners, is implementing a PFM reform agenda to strengthen the IFMIS and reporting and oversight functions, which should resolve some of the identified risks. Some ring fencing arrangements will be implemented until such time as the reforms are felt.</li> <li>The project will not be mainstreamed in the Ministry. It will use a separate and exclusive accounting package for transaction-processing and reporting.</li> </ul>	<b>S</b>
<b>Entity Level</b>			
<ul style="list-style-type: none"> <li>Multiple entities will be implementing the project, giving rise to problems of coordination, especially in reporting.</li> <li>MOAIWD has been involved in serious issues pertaining to control and accountability.</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>The Project FM will be coordinated by the PMT, working under the direction of the Ministry, which has experience in handling projects implemented by different MDAs.</li> <li>The PMT arrangement will substantially insulate the Project against direct influence by the Ministry.</li> </ul>	<b>S</b>

• <b>Project Level</b>			
<ul style="list-style-type: none"> <li>Project is complex, will have several implementing agencies, and will involve a large amount of resources and complex contracting/procurement arrangements.</li> <li>Large size of the project inherently places a high-risk exposure to the proper use of project resources, despite increased oversight by the Bank.</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>Activities to be carried out by various entities will be captured in annual work plans and budgets, agreed on by the Government and the Bank, as the basis for implementation.</li> <li>The PMT will have the required skills and competencies to enable effective implementation.</li> </ul>	<b>S</b>
• <b>Budgeting</b>			
<ul style="list-style-type: none"> <li>Ministry budget lacks detail, and budget monitoring systems are weak.</li> </ul>	<b>S</b>	<ul style="list-style-type: none"> <li>Activity-based annual work plans and budgets will be informed by the PAD to provide clarity on activities to be carried out and monitored.</li> </ul>	<b>S</b>
• <b>Accounting</b>			
<ul style="list-style-type: none"> <li>Weak accounting systems that are unable to process and report on transactions properly.</li> <li>Staff inexperienced in project accounting.</li> </ul>	<b>S</b>	<ul style="list-style-type: none"> <li>The Project will have its own accounting package for transaction processing/reporting. An accounting manual, detailing policies, procedures &amp; controls will be prepared.</li> <li>Staff will be trained in FM for Bank-funded activities.</li> </ul>	<b>M</b>
• <b>Internal Control</b>			
<ul style="list-style-type: none"> <li>Weak control environment due to poor enforcement of existing regulations. Weak management oversight and inadequate internal audit functions.</li> <li>Project will include large irrigation contracts which could be susceptible to elite capture.</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>PMT setup will mitigate the weak control environment associated with mainstream government entities. The Accounting Manual will specify Control Procedures when using Project resources.</li> <li>Project must be internally audited at least twice a year.</li> <li>Incorporate corruption-prevention and reporting mechanisms through collaboration with Anti-Corruption Bureau. This should include social accountability mechanisms covering public reporting; the use of community volunteers and civil society organizations in social audits; and the disclosure of project information.</li> <li>Regular Bank reviews will be conducted, including technical reviews of major contracts.</li> </ul>	<b>S</b>

<b>Funds Flow</b>			
<ul style="list-style-type: none"> <li>Delays in flow of funds to finance planned activities, and possibility of misappropriation of PPA funds, or use for unintended purpose.</li> </ul>	<b>S</b>	<ul style="list-style-type: none"> <li>The Project will open an exclusive US Dollar account and Kwacha operating account for funds flow.</li> </ul>	<b>M</b>
<b>Financial Reporting</b>			
<ul style="list-style-type: none"> <li>Delays in submission of reports.</li> <li>Staff in experienced in WB-funded project reporting.</li> </ul>	<b>S</b>	<ul style="list-style-type: none"> <li>The reporting format will be agreed to with the Bank. The reporting template to be embedded in the accounting software to ensure accuracy and timeliness of reports.</li> </ul>	<b>M</b>
<b>Auditing</b>			
<ul style="list-style-type: none"> <li>National Audit Office (NAO) does not use International Standards on Auditing fully, creating a risk that the audit approach and opinion may not be sufficiently reliable.</li> <li>Unacceptable audits, untimely submission of audit reports, and lack of follow-up on audit findings.</li> </ul>	<b>S</b>	<ul style="list-style-type: none"> <li>The audit will be based on agreed TORs which will specify the approach, scope and timing.</li> <li>Follow-up of audit findings will be done by the Internal Audit of the Ministry as well as Bank FM staff during Implementation Support Missions (ISMs).</li> </ul>	<b>S</b>

*RISK Categories:*

*H-High*

*S-Substantial*

*M-Moderate*

*L-Low*



## 1.2 Financial Management Arrangements

### Budgeting

MoAIWD's budgeting process is deemed adequate. The Ministry, through the PMT, will prepare activity-based annual work plans and budgets, guided by the PAD and the PIM.

### Accounting

The **TOMPRO accounting package** has already been installed and is being used for transaction processing and reporting by the PMT managing the PPA. The same package will be used for the main project.

An accounting manual will be prepared for the main project, detailing policies and procedures to be followed in carrying out project transactions.

The PMT is required to have a qualified FM Specialist and an Assistant FM Specialist, in addition to at least two accounts assistants assigned from Government.

### Internal auditing

The internal auditing environment of MOAIWD requires close monitoring to ensure controls are adhered to. The Government will have to address the position of audit committees in order to strengthen internal audit functions and the effectiveness of internal controls.

### Internal control systems

The accounting manual will specify policies and procedures, including internal controls required when using project resources. This will help ensure funds are used for intended purposes, in an economical and efficient manner. The Bank FM team will conduct periodic reviews based on assessed risks, and will follow up on agreed actions designed to strengthen the Project's FM systems.

### Financial reporting

MOAIWD, through the PMT, will produce quarterly unaudited **Interim Financial Reports (IFRs)** for the designated account and the related project account. The IFRs are to be produced on a quarterly basis, and submitted to the Bank **within 45 days after the end of the calendar quarterly period**.

MOAIWD will agree with the Bank on the format and content of IFRs. The reporting requirements will be incorporated into the accounting package to enable the automatic generation of IFRs.

**Interim Financial Reports** submitted to the Bank must have the following *minimum* information:

- Statement of Sources and Uses of Funds by category
- Statement of Uses of Funds by Project Activity/Component
- Designated Account (DA) Activity Statement
- Bank Statements for both the Designated and Project Account
- Summary Statement of DA Expenditures for Contracts subject to Prior Review
- Summary Statement of DA Expenditures not subject to Prior Review

## **Auditing**

The Project will procure the services of an **external auditor**; with TORs agreed with by the Bank.

The Project will prepare **the annual audited accounts**/financial statements, which must be submitted to the Bank **within 6 months after the end of the accounting year** i.e. no later than December 31.

The audited accounts must be prepared in accordance with International Public Sector Accounting Standards.

The accounts/financial statements will comprise:

1. **A statement of Sources and Uses of funds/cash receipts and payments**, which recognizes all cash receipts, cash payments and cash balances controlled by the entity and separately identifies payments by third parties on behalf of the entity.
2. **The Accounting Policies Adopted and Explanatory Notes**. The explanatory notes should be presented in a systematic manner, with items on the Statement of Cash Receipts and Payments being cross-referenced to any related information in the notes. Examples of this information include a summary of fixed assets by category of assets, and a summary of the IFR Withdrawal Schedule, listing individual withdrawal applications.
3. A **Management Assertion** that Bank funds have been expended in accordance with the intended purposes as specified in the relevant World Bank legal agreement.

## **Fraud and corruption**

1. The major contract under the project is the construction of irrigation infrastructures, which falls under the WB's prior review contracts, and thus will be subjected to necessary WB oversight checks.
2. The Project will have procedures and controls to ensure that transactions have integrity, and fraud and errors are minimized.
3. The Project will be subjected to both external and internal auditing, which will further provide

assurance as to compliance with both Bank and Government policies and procedures.

4. Through its oversight, the Bank team will ensure compliance with Bank procurement and financial management rules. Bank procurement and financial management specialists will review documentation, carry out office visits, interviews and inspections, and recommend actions to be taken if any inconsistencies are identified.
5. Bank technical experts will be involved in the review of all documentation deemed necessary, including but not limited to: prequalification documents, requests for proposals, TORs, bidding documents, contract documents, and evaluation awards.
6. In terms of Government institutional building, the Bank will ensure that staff training in procurement and financial management is offered to strengthen internal technical capacity.
7. The use of whistle-blowers is proposed to further combat corruption and other forms of fraudulent activities. There are already a number of organizations, including Bank-funded activities, that use Reward Anonymous, managed by Deloitte.

## Financial Management Action Plan

The actions needed to enhance the financial management arrangements for the Project are outlined in Table 3.

**Table D-3: Actions and deadlines for progressing the FM Action Plan**

	Action	Date due	Responsible
1	Procure FM TAs	before effectiveness	MoAWDI/IDA
2	Acquire and install accounting software for project accounting and reporting	before disbursement effectiveness	MoAWDI
3	Open designated account	upon effectiveness	MoAWDI
4	Agree on format of interim financial report with the Bank	before negotiation	
5	Devise anti-corruption measures to deal with CDD and possible elite capture	six months after effectiveness	MoAWDI
6	Agree on audit terms of reference	before negotiation	MoAWDI/IDA
7	Arrange for half-yearly internal auditing of the project	before negotiation	MoAWDI

## Implementation Support Plan

Table D-4: Implementation support activities and frequency

FM ACTIVITY	FREQUENCY
<b>Desk Reviews</b>	
<ul style="list-style-type: none"> <li>Interim financial reports review</li> </ul>	Quarterly
<ul style="list-style-type: none"> <li>Audit report review of the program</li> </ul>	Annually
<ul style="list-style-type: none"> <li>Review of other relevant information such as interim internal control systems reports</li> </ul>	continuous as they become available
<b>On-site visits</b>	
<ul style="list-style-type: none"> <li>Review of overall operation of the FM system</li> </ul>	semi-annual for MOAWDI (implementation support mission)
<ul style="list-style-type: none"> <li>Monitor actions taken on issues highlighted in audit reports, auditors' management letters, internal audits and other reports</li> </ul>	as needed
<ul style="list-style-type: none"> <li>Transaction reviews (if needed)</li> </ul>	as needed
<b>Capacity building support</b>	
<ul style="list-style-type: none"> <li>FM training sessions</li> </ul>	during implementation; when and as needed

The implement support plan follows the outcome of the WB's FM risk assessment, the conclusion of which is as follows: *The FM arrangements meet the Bank's minimum requirements under (1) Bank Directive: Financial Management Manual for World Bank Investment Project Financing Operations (Catalogue number OPCS5.05-DIR.01) Issued (Retrofitted): February 4, 2015 and effective from March 1, 2010, and (2) Bank Guidance: Reference Material-Financial Management in World Bank Investment Project Financing Operations (Catalogue Number OPCS5.05-Guid.02) Issues and effective February 24, 2015. The residual risk is substantial.*

## Disbursements

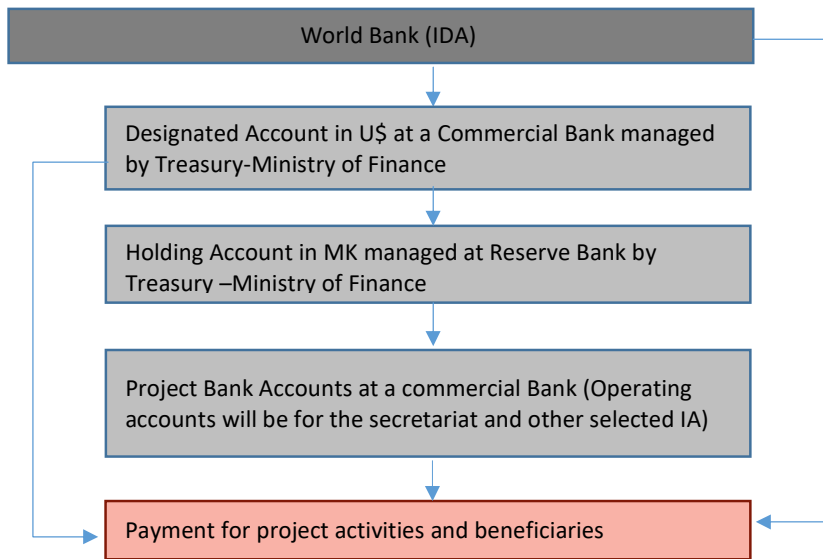
### Banking arrangements

The Government will open a DA in Dollars at the Reserve Bank of Malawi or a commercial bank acceptable to the World Bank, as well as a Kwacha operating account, also acceptable to the Bank.

### Funds flow arrangements

- MoAIWD will prepare a six-month cash flow forecast based on agreed work plans, then submit a withdrawal application request to the Bank (IDA) through the Ministry of Finance.
- IDA will process the withdrawal application and disburse funds to the DA in US dollars.
- Ministry of Finance will transfer funds from the DA into the Project Account as and when required in local currency. Ministry of Finance can also transfer counterpart funds into Project Accounts.

- Project expenditure can be paid from either the DA, the Project Kwacha Account, or directly from the World Bank to suppliers.



**Figure D-1: Funds flow chart**

## **IDA Disbursement Methods**

### **Special commitments and direct payments**

Special Commitments using irrevocable letters of credit may be used as well direct payments to suppliers for works, goods and services (upon the borrower's request).

### **Report-based disbursements**

The Project will also receive funds into the designated account using the report-based disbursement method. IDA will make the initial disbursement to the Project after receiving a withdrawal application with a six-month cash flow forecast. This withdrawal application must be prepared within one month after project effectiveness. Thereafter, IDA will disburse into the respective DA based on quarterly IFRs, which will provide actual expenditure for the preceding quarter (3 months) and cash flow projections for the next 2 quarters (6 months). The IFR will be reviewed by the Bank's FM Specialist and approved by the Task Team Leader (TTL) before the request for disbursement is processed by the Bank's Loan Department.

### **Reimbursements:**

These can also be made to the DA. The payments will be reported in quarterly IFRs.

**The IDA Disbursement Letter will provide details about each of the above disbursement arrangements.**

## 2. Procurement



### 2.1 Legal Aspects and Procurement Practices

1. Procurement must be carried out in accordance with:
  - Guidelines: Procurement of Goods, Works and Non-Consulting Services under IBRD Loans and IDA Credits & Grants by World Bank Borrowers, January 2011, Revised July 2014
  - Guidelines: Selection and Employment of Consultants IBRD Loans and IDA Credits & Grants by World Bank Borrowers, January 2011, Revised July 2014
2. Public Procurement in Malawi is governed by the Public Procurement Act of August 2003. National Competitive Bidding (NCB) must be undertaken in accordance with this Act and its Public Regulations 2004.
3. The Office of the Director of Public Procurement (ODPP) is responsible for public procurement oversight.
4. All Ministries and Departments have Internal Procurement Committees (IPCs) and Specialized Procurement Units (SPUs) established and responsible for procurement.
5. Procurement Regulations and Desk Instructions have been distributed to all procuring entities.
6. The ODPP has established a dedicated website for information-sharing, placing of adverts and notifications of awards.
7. The Malawi Institute of Procurement & Supply Act, 2016 provides for the registration of procurement and supply chain management professionals, and the regulation of the profession.

### 2.2 Implementation Arrangements

Procurement under the SVTP is necessary for procurement of civil works, irrigation land development and for the hiring of specialized technical assistance, project implementation services and equipment.

MoAIWD is the lead institution on procurement, and requires technical assistance for this function. The PMT in Blantyre is responsible for the procurement of all goods, consultancies, works and services under the project.

## Capacity Assessment of MoAIWD

1. A Senior and an Assistant Procurement Specialist need to be recruited to undertake procurement functions.
2. The IPC based at Tikwere House (MoAIWD) is responsible for oversight functions and awarding of contracts.
3. The IPC at Tikwere is responsible for all contracts above Bank prior review.
4. The existing IPC at the Regional, chaired by the Regional Irrigation Engineer, must be empowered to award contracts which are below Bank prior review and to which the WB has provided its No Objection (or in the case of Consultancy Services, a No Objection has been given for the Consultancy Terms of Reference).
5. For Project issues to be properly presented to the IPC both at Tikwere and in Blantyre, the Project Coordinator and the Senior Procurement Specialist should be opted members, and should be present only when such issues are being discussed.
6. Due to low capacity within the Ministry, contract management is an issue that needs close monitoring.
7. The Project is currently housed in renovated guest house owned by the Ministry, but extra rooms need to be made available so that all Project staff can be accommodated.
8. Additional office equipment such as computers, desktops, printing machines and phones will be required for the additional staff recruited by the Project.
9. It is important to have a vibrant internet system as well as additional vehicles to support project activities.

### Internal Procurement Committee (IPC)

Chair: Director of Administration  
Secretary: Principal Procurement Officer  
Accountant

Members: Director of Irrigation Services  
Director of Water Supply  
Director of Water Resources  
Director of Human Resources

Based on the assessment, the **overall risk for the project is substantial** and the following mitigation measures are proposed: (i) attending short procurement courses within the region at a later stage by key personnel handling procurement; (ii) strengthening of complaint-handling mechanism; and (iii) post-review by the Bank, as per the risk rating.

Table D-5: Procurement risks and mitigation measures

<b>PROCUREMENT RISKS &amp; MITIGATION MEASURES</b>			
<b>Identified risks</b>	<b>Initial Risk</b>	<b>Mitigation measures</b>	<b>Residual Risk</b>
<ul style="list-style-type: none"> <li>Record-keeping and documentation</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>Ministries in Lilongwe and Blantyre, and PMT in Blantyre maintain all procurement records, duly catalogued and indexed to facilitate easy access to information.</li> </ul>	<b>S</b>
<ul style="list-style-type: none"> <li>Fiduciary risk relating to main principles of the Bank Procurement Guidelines</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>Experienced procurement staff/consultant positioned to guide implementing activities.</li> <li>Attend training in Bank and PPP procurement procedures.</li> <li>Regular supervision support and monitoring.</li> </ul>	<b>S</b>
<ul style="list-style-type: none"> <li>Inefficiencies and delays in procurement process</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>Regular monitoring through procurement plan and STEP.</li> </ul>	<b>S</b>
<ul style="list-style-type: none"> <li>Contract management</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>Disclosure of all contract awards (UNDB Magazine for prior contracts, post review contracts in local newspapers and on ODPP website).</li> </ul>	<b>S</b>
<ul style="list-style-type: none"> <li>Probability of staff handling procurement resigning</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>Dialogue with Government to retain trained staff of PMT.</li> </ul>	<b>S</b>
<ul style="list-style-type: none"> <li>Fraud and corruption risks (including collusion &amp; outside interference) in contracting process</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>Disclosure of procurement plan.</li> <li>Disclosure of contract awards.</li> <li>Creating awareness on effects of fraud and corruption.</li> <li>Regular reviews such as PPR, internal audits &amp; external audits.</li> </ul>	<b>S</b>
<ul style="list-style-type: none"> <li>Weak complaint redress system</li> </ul>	<b>H</b>	<ul style="list-style-type: none"> <li>Disclosure of complaint redress procedures through ODPP.</li> <li>Bi-annual report of all complaints received and actions taken.</li> </ul>	<b>S</b>
<b>OVERALL RISK</b>			
HIGH	<b>H</b>	SUBSTANTIAL	<b>S</b>



## 2.3 Selection of Consultants

Requirements for all consultancy services under IDA financing:

- For consultant assignments estimated to cost more than US\$200,000 or equivalent per contract, firms must be selected using Quality and Cost Based Selection (QCBS) procedures.
- For consultant assignments estimated to cost less than US\$200,000 or equivalent per contract, firms may be selected using the Consultants' Qualifications methods.
- Consulting firms required to carry out standard or routine assignments such as audits must be selected using the Least Cost Method.
- Individual consultants must be selected based on educational qualifications and experience in accordance with Chapter V of the Consultants Guidelines.
- Single Source selection should be used where it can be justified and after consultation with the World Bank.
- All single source consultants from firms must be subject to prior review of the Bank.
- The prior review threshold for consultants' services are US\$100,000 equivalent per contract for individual consultants and US\$200,000 equivalent per contract for firms (Table 6).

Table D-6: Prior review threshold for consultancy services

Selection Method		Prior Review Threshold
1.	Competitive Methods (Firms such as QCBS, CQS, QBS, Fixed Budget, Least Cost Selection)	above US\$200,000
2.	Works Supervision	above US\$300,000
3.	Single Source (Firms)	all Values
4.	Individual Consultants	above US\$100,000

## 2.4 Procurement of Works, Goods and Non-Consultant Services

### Direct Contracting

(See Procurement Guidelines, paragraph 37)

- Direct contracting for the procurement of civil works and goods may be used to **extend an existing contract** or **award a new contract**.
- For such contracting to be justified, the Bank must be satisfied that the price is reasonable and that no advantage could be obtained by further competition.
- The direct contracting may be from the private sector, UN agencies/programs (for goods), or contractors or NGOs.

### Shopping

(See Procurement Guidelines, paragraph 37)

- Shopping may be an appropriate method for procuring readily-available off-the-shelf goods of less than US\$200,000, or simple civil works of less than US\$200,000.
- The procurement plan must determine the cost estimate of each contract, and the aggregate total amount.
- The borrower must solicit at least three price quotations for the purchase of goods, materials, small works, or services (non-consulting), to formulate a cost comparison report.

### National Competitive Bidding (NCB)

**Any contract exceeding the shopping threshold is subject to NCB.**

**All bidding must be guided by:**

- **the model bidding documents for NCB, as agreed upon with ODPP**
- **the Malawi Public Procurement Act**

The following NCB exceptions shall apply:

- No bidder or potential bidder shall be declared ineligible to bid for reasons other than those provided in Section I of the Bank Procurement Guidelines.
- Bidding documents acceptable to the International Development Association must be used.
- The bidding documents and contract shall include provisions reflecting the Bank's policy relating to firms or individuals found to have engaged in fraud and corruption, as defined in the Procurement Guidelines;

- Each bidding document and contract shall provide that bidders, suppliers and contractors, and their subcontractors, agents, personnel, consultants, service providers, or suppliers, shall permit the Association to inspect all accounts, records, and other documents relating to the submission of bids and contract performance, and to have them audited by auditors appointed by the Association. Acts intended to materially impede the exercise of the Association's inspection and audit rights provided for in the Procurement Guidelines constitute an obstructive practice as defined in the Procurement Guidelines;
- Unquantifiable criteria, such as local content, technology transfer, and managerial, scientific, and operational skills development, shall not be used in the evaluation of bids; and
- Contracts may not be split into small lots, and their award may not be restricted to small enterprises for purposes of promotion of the participation of small enterprises.

### **Force Account**

When contractors/suppliers are unlikely to bid at reasonable prices or a certain government agency has sole rights in certain type of works/supply, borrowers may use their own government departments' personnel and equipment or government owned construction unit. This may be the only practical method and may be used provided that the agency has sufficient managerial capacity and possesses the required technical and financial controls to report to the Bank on expenditure as per paragraph 3.9 of the Procurement Guidelines.

### **Framework Agreements (FAs)**

Framework Agreements shall be used as an alternative to NCB or Shopping for:

- goods that can procured off-the shelf, or are commonly used with standard specifications;
- non-consulting services of a simple and non-complex nature; and
- small works under emergency.

Amounts for the FAs shall be set in the Procurement Plan and agreed to with the Bank.

## Use of Government institutions and parastatals

Government-owned institutions or parastatal organizations in Malawi may be hired for their unique and exceptional nature if their participation is considered critical to project implementation.

In such cases, the conditions given in clauses 1.13 of Consultant Guidelines must be satisfied. Each case will be subject to prior review by the Bank.

**Table D-7: Prior review thresholds for goods, works and non-consulting services**

	<b>Procurement Method</b>	<b>Prior Review Threshold (US\$)</b>	<b>Comments</b>
<b>1.</b>	ICB and LIB (goods) and non-consultant services	<i>Above 1 million</i>	<i>All</i>
<b>2.</b>	NCB (goods) and non-consultant services	<i>Below 1 million</i>	<i>First Contract</i>
<b>3.</b>	ICB (works)	<i>Above 7 million</i>	<i>All</i>
<b>4.</b>	Shopping (goods) and non-consultant services	<i>Below 200,000</i>	
<b>5.</b>	NCB works	<i>Below 7 million and above 200,000</i>	<i>First Contract</i>
<b>6.</b>	Shopping works	<i>Below 200,000 million</i>	
<b>7.</b>	Direct contracting	<i>All Values</i>	

### Other conditions

If requested by an implementing agency, the Bank will consider the further simplification of procedures as long as they fall within the overall framework of Bank Guidelines.

### Prior review and associated thresholds

The Bank will review the procurement plan and the set of standard bidding documents to be used for works, goods and non-consulting services.

The format of these documents, as well as the procurement methods and the thresholds for prior review should be reviewed and jointly agreed on by MoAIWD and the IDA.

Contracts which are not subject to prior review shall be selectively reviewed by the Bank (or by an independent Procurement Auditor on its behalf) during project implementation. Such contracts will be governed by the procedures set out in paragraph 4 of Appendix I of the Guidelines.

All documentation used for procedures of contracting, recruitment of consulting services, evaluation and award shall be retained for subsequent examination by auditors and IDA supervision missions.

## **Risk of fraud and corruption**

Necessary steps such as whistle blowing, citizen engagement and open contract monitoring by Non - Government Organizations will reduce project risk in this area.

## **Procurement plan**

- The Project procurement plan must detail the activities to be carried out during the first 18 months and reflect the actual project implementation needs. The plan must be prepared by the GoM and submitted *before* negotiations, as it is part of the package that must be submitted for Board approval.
- For each contract that is financed under the project, the Borrower and the Bank must agree on the procurement method/s, estimated costs, prior review requirements and time frames.
- The procurement plan must be made available in the Project database and on the Bank's external website once it is finalized.
- The procurement plan must be updated annually and must reflect any changes in prior review thresholds.
- The Bank normally carries out Implementation Support Missions on a semi-annual basis. The frequency of these missions may increase or decrease, depending on the procurement performance of the Project.
- All contracts below the specified prior review threshold value shall be subject to Post Review by the Bank; the first contracts will be reviewed one year after project effectiveness.
- Smallholder-owned commercial farm enterprises (SOCFEs) will be provided with matching grants.
- Procurement will follow acceptable international standards and commercial practices, as applied by commercial institutions in goods and services procurement.
- Before commencement, the Bank will undertake a capacity assessment of each cooperative and, based on the assessment, will provide a risk assessment upon which procurement thresholds will be based for each cooperative.
- Procurement under SOCFEs, WUOs or WUAs, which will be provided with matching grants must follow acceptable international standards and commercial practices as applied by commercial institutions in goods and services procurement. However, the Bank will first undertake a capacity assessment of each organization concerned and, based on this, provide a risk assessment upon which the procurement threshold will be based.

# 3. Social & Environmental Safeguards

## 3.1 Overview

The Environmental and Social Management Plan (ESMP) and Resettlement Action Plans (RAPs) will be prepared in accordance with the Resettlement Policy Framework (RPF). The PMT will employ safeguards personnel, as well as a management consultant team consisting of environmental and social staff and a communications expert. These personnel will assist with the implementation of the safeguards instruments, as the current institutional capacity of the borrower to implement them is limited, especially at district and village levels, thus posing a risk to the success of the project.

### Poverty and social inclusion

The project is designed for smallholder farming communities in the targeted area, which is one of extreme poverty, and the most disaster-prone in the country. Communities will benefit through improved productivity, farm organization, production support, marketing support, and services.

The project has social functions which extend beyond productivity, such as a water supply to Chikwawa boma, and support for livelihoods through community engagement in the management of conservation areas. Studies have been completed to identify and plan for the full range of social impacts that a project of this size and scope could have in a poor rural area with well-identified vulnerabilities. The studies included a socio-economic baseline study, a land tenure diagnostic, a gender and youth study, a communication study, and a political economy analysis.

From its inception, the program has emphasized an inclusive approach that will continue during implementation. This has been followed up by engaging communities through structured consultations, focus group discussions and has designed the agricultural development strategy on farmer's preferences and local successful models of organization.

By focusing strongly on women, youth, and multiple-use systems, and embedding these into the overall land-use plan, it is believed that benefits will spread into the community. The financial structuring of the project takes into account the poverty levels of beneficiaries, in order that poverty not be a reason to opt out of farm development. The job creation that will come out of agricultural intensification should have an additional stabilizing effect on the local economy and society.

If carefully implemented, the SVTP can be an engine for broad-based growth. However, there are economic limits to which areas can be irrigated, and clear communication will be essential in villages where the farmers cannot be served by the canal.

### **Citizen engagement**

The communications strategy and the grievance redress mechanism will be targeted at primary beneficiary communities, and will build on local social arrangements. The communications strategy will detail the easiest and most acceptable ways in which to have open communication with affected people and communities throughout the course of the project. Relevant information for all aspects of the project, its stages of construction, and the establishment of irrigation blocks will be provided. The strategy will also outline the ways in which individuals can have a voice and express their concerns, and how these concerns will be addressed and monitored.

### **Gender and youth**

The program will focus on the participation of youth, women, and female-headed households. A Gender and Youth Strategy has been developed for the program which highlights the following:

<p>The literacy and education rates of women are considerably lower than those of men, especially in the over-35 age group.</p>	<p>Even in matrilineal societies, adult males dominate land access and control and the revenue from production.</p>	<p>The participation of women and youth in the institutions which govern the water sector is often limited.</p>
<p>Women are less empowered to attain their rights in society than men.</p>	<p>Female-headed households have the most difficulty obtaining access to financing.</p>	<p>Few women formally own land, so their participation and representation in WUAs is usually low</p>

**Figure D-2: Key issues highlighted in the SVTP Gender and Youth Strategy**

The Gender and Youth strategy is designed to ensure inclusion and aims to achieve gender-balanced outcomes including:

<input checked="" type="checkbox"/>	Gender aspects are included in all TORs.
<input checked="" type="checkbox"/>	Staff is sensitized to youth and gender issues.
<input checked="" type="checkbox"/>	Communication activities and consultation processes genuinely focus on issues relevant to women and youth.
<input checked="" type="checkbox"/>	All M&E and other data collection instruments collect gender and youth-disaggregated data.
<input checked="" type="checkbox"/>	Women, youth and vulnerable groups are represented and participate in consultations and management entities.
<input checked="" type="checkbox"/>	All PAPs are gender-, age- and poverty-defined.
<input checked="" type="checkbox"/>	Land tenure administration is safeguarded against male capture.
<input checked="" type="checkbox"/>	The joint registration of land is encouraged where possible.
<input checked="" type="checkbox"/>	Women enjoy de facto equality in access to land and shares in farm enterprises.
<input checked="" type="checkbox"/>	The partial transfer of land to youths is encouraged.
<input checked="" type="checkbox"/>	Grievance redress mechanisms provide a gender-safe space.
<input checked="" type="checkbox"/>	Safe multiple use of irrigation water is actively promoted, including for household use.
<input checked="" type="checkbox"/>	Young adult employment, especially in commercial value chain ventures that are enabled or strengthened by the commercial irrigation approach is encouraged during construction and afterwards.
<input checked="" type="checkbox"/>	Women and youth are empowered through social mobilization to actively partake in various organizations, committees and institutions established under the program.
<input checked="" type="checkbox"/>	Gender impacts of the program, as well as vulnerability trends, are independently monitored and programs are adjusted when necessary.



## 3.2 Social Safeguards

Social inclusion, citizen engagement, and gender and youth are included through the proposed project activities in addition to being addressed in the ESMP, RPF and RAPs. The following are some of the identified **social risks** related to SVTP:

- There has not yet been any experience of consolidating land under the new Land Act.
- There is a scarcity of land in the area for those who must be resettled because of the irrigation infrastructure.
- There is a potential time-lag between land consolidation and the first irrigation service.
- Farmers in the future irrigation blocks will be relinquishing individual land parcels for a future share in a commercial enterprise that will operate as a consolidated farm. This has possible consequences for food security, and business risks the future enterprises must face will create uncertainty.
- The need for agreement within communities on options for those who opt out of the scheme.

While this is an area of rich heritage and archaeology, the project as it is currently designed will not affect any known cultural heritage areas. However, the RPF and ESMP have detailed provisions for chance findings, and additional measures for graveyards should they be necessary.

### Resettlement Policy Framework (RPF)

Certain factors necessitated the preparation of a Resettlement Policy Framework (RPF) before the development of Resettlement Action Plans (RAPs), which can only be done later in the project.

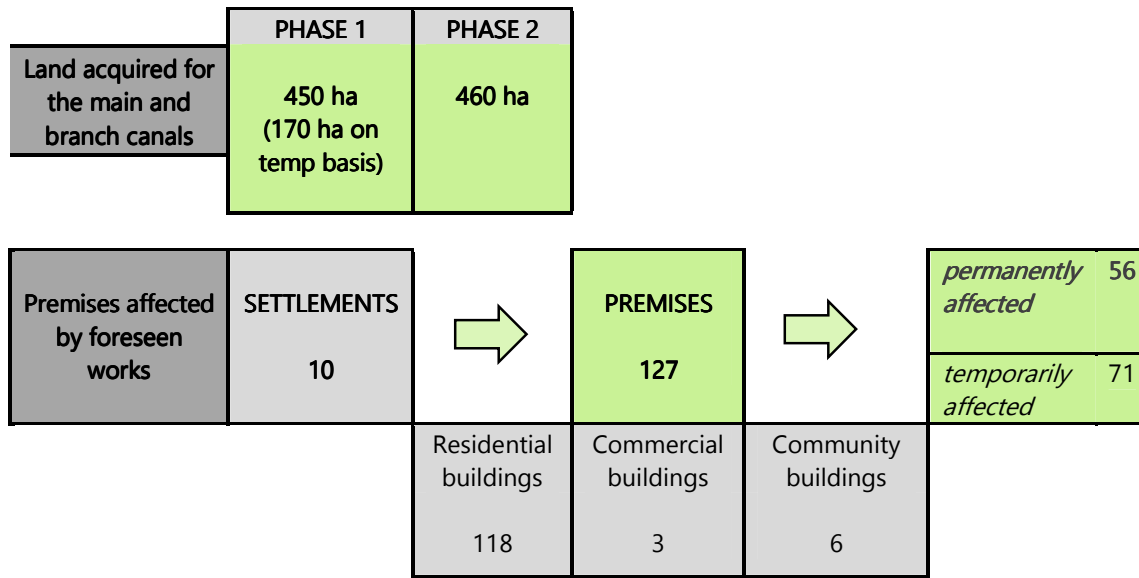
- The final alignment of the main canal and associated infrastructure is still to be determined. Until then, the identification of affected land and the precise census of PAPs required for the development of RAPs cannot be completed.
- The location and configuration of the consolidated irrigated blocks will only be determined as part of a participatory process during project implementation.
- Land consolidation processes need to be specific to GVs and blocks and thus developed over time.

<b>ESMP</b>	Environment & Social Management Plan
<b>RPF</b>	Resettlement Policy Framework
<b>RAP</b>	Resettlement Action Plan
<b>PAP</b>	People Affected by the Projects
<b>GV</b>	Group Village

The RPF that was prepared and consulted upon has been disclosed, while **site-specific RAPs will be prepared during the project as necessary**. The RAPs will be reviewed, approved and disclosed in-country and at the InfoShop, prior to the commencement of civil works.

The **general location** of the project area has already been established. Based on the feasibility study design, it has been possible to include extensive detailed socioeconomic data on potentially affected communities in the RPF.

**Estimations are for planning purposes only**



**FigureD-3: Estimated land area and settlements affected by the planned construction works**

The specific PAPs will change with foreseen design revisions, but the overall numbers are expected to be within this same estimate. Based on consultations with each potentially affected settlement, it is expected that all households directly affected can be reallocated in their current settlements.

**stakeholder consultation**

- mitigation measures for different type of impacts
- mechanisms for creating irrigation blocks and establishing farmers’ organizations
- implementation arrangements for resettlement
- grievance redress mechanisms

**Extensive consultations** with a wide range of stakeholders at national, district and village levels were an integral part of the detailed RPF preparation.

Separate **focus group discussions** were held with women, men and leaders in each of the GVs. Specifically, the RPF identifies categories of People Affected by the Project (PAP). Table D-8 shows a summary list of the identified PAPs and related RPF provisions.

**Table D-8: Identified People Affected by the Project (PAPs) and related RPF provisions**

People Affected by the Project (PAPs)	Related RPF provisions
<ul style="list-style-type: none"> <li>• People losing agricultural land to the canals</li> </ul>	⇒ given replacement land, or cash where insufficient land is available
<ul style="list-style-type: none"> <li>• People losing residential land or commercial establishments to the infrastructure</li> </ul>	⇒ given alternative land in adjoining villages, in addition to cash for improvements, and resettlement assistance
<ul style="list-style-type: none"> <li>• Livestock owners losing access to grazing and migration routes</li> </ul>	⇒ accommodated by design provisions
<ul style="list-style-type: none"> <li>• People giving up land for company shares in future irrigation blocks (where the shares are estimated to be of considerably greater value than the land – see economic analysis).</li> </ul>	⇒ develop a legally-strong land tenure bundle of rights in a fallback position in case of company dissolution
<ul style="list-style-type: none"> <li>• Communities who may be split by the canal or otherwise affected</li> </ul>	⇒ supported with investments linked to community-based mitigation plans to reduce adverse impacts of the canal

### **Land consolidation**

Farmers who participate in the irrigation schemes will undergo a process of land consolidation in which they relinquish land for its inclusion in a cooperative company. The development of land blocks will be based on expressed demand.

The farmer groups forming the company will be given land tenure security, and will be assisted with the preparation of their farms and provided with capacity-building. If, during the process of farmland preparation, it is unavoidable that farmers lose a cropping cycle (e.g. due to ongoing land-leveling), the farmers will be compensated.

**Landholders can  
opt out,  
either individually or  
as a group.**

If the block is formed on land which includes the land of farmers who decide to opt out, the farmers will be provided with alternative land of equal value in their vicinity, with a preference for land that is not irrigable (due its elevation or other factors).

## Labor influx

Labor-specific details will not be known until ESMPs and RAPs covering construction activities are developed. Contractor oversight by the project's Supervising Engineer and the project-level GRM will be the major vehicle through which potential labor influx issues are identified and addressed.

It is assumed that contractors will bring in engineers and experienced equipment operators from outside the region, who are likely to be housed in work camps during construction. A screening process will be carried out as part of the ESIA to gauge the likely size of the imported workforce (who may have different cultural values and mores), relative to local communities, and their impact on the community. The Project will recruit **community development specialists** who will work with the communities on development issues throughout the project lifetime.

**Table D-9: Indicative rules for the ESMP that will be applied to works contracts**

<b>Rules for contractors in the ESMP &amp; Works Contracts must include:</b>	
⇒	measures for managing the potential impacts of an outside workforce on the local community
⇒	provisions for encouraging and maximizing local hiring
⇒	awareness raising within the communities
⇒	environment, health and safety guidelines
⇒	codes of conduct for workers
⇒	penalties for failing to abide by codes of conduct

## 3.3 Environmental Safeguards

**The Shire Valley Transformation Program is a large-scale, Category A project with multiple, complex environmental impacts.**

Impacts relate to new canal infrastructure, the expansion of irrigated croplands, and water abstraction from the Shire River. It is expected that, with sufficient effort and due diligence, the adverse impacts can and will be adequately mitigated. With the additional environmental enhancement activities planned under the GEF-funded Component, along with the SVIP (Phase II) improvements to water availability in Lengwe National Park, the project is expected to achieve a net positive impact from an environmental standpoint.

Agricultural intensification optimizes resource -use and concentrates agricultural production and economic activity onto a smaller footprint. This should reduce pressures on remaining natural resources in the Shire Valley. A natural resources management-based approach to complement agricultural intensification will be implemented.

The program embeds irrigation development into a broader land-use plan, recognizing set-aside areas and natural habitats. The project is expected to achieve a net positive impact from an environmental standpoint due to:

- (i) the environmental benefits of shifting pump-based irrigation to gravity;
- (ii) the additional environmental enhancement activities planned under the natural resources component; along with
- (iii) the SVIP-II improvements to water availability and environmental services in Lengwe National Park.

A Project Environmental and Social Impact Assessment (ESIA), an Environmental and Social Management Plan and a Pest Management Plan have been prepared, consulted upon and disclosed in-country (date) and at the InfoShop (date). Table 10 shows a summary of the key environmental issues identified and mitigation measures planned.

**Table D-10: Key environmental issues and mitigation measures**

<b>key environmental issues</b>		<b>mitigation measures</b>
<b>1</b>	<i>Protecting Lake Malawi from invasive fish species</i>	→ main Canal design within Majete Wildlife Reserve includes a fish weir (with a vertical drop of at least 3 m)
<b>2</b>	<i>Majete Wildlife Reserve impacted by the feeder canal</i>	→ mitigation measures are included in the project design
<b>3</b>	<i>Lengwe National Park impacted in SVIP Phase II</i>	→ mitigation measures for design & construction and environmental services included in conceptual design
<b>4</b>	<i>Elephant Marsh impacted by flow reduction</i>	→ long-term hydrological and ecological monitoring program planned along with adaptation
<b>5</b>	<i>Irrigation area set-aside lands</i>	→ final layout of irrigation works and blocks will avoid any overlap with existing natural habitats & other environmentally sensitive areas.
<b>6</b>	<i>Canal design and construction</i>	→ canal will be designed for safety for humans & animals, and project-initiated borrow pits will have innovative rules on decommissioning.

## Protecting Lake Malawi from invasive fish species

For SVIP to function as a purely gravity-fed (rather than pumped) irrigation scheme, the water intake from the Shire River needs to be located above Kapichira Falls. With a drop of about 75 meters, Kapichira Falls provides a natural, absolute barrier to the upstream movement of all Shire River fish species. As a result, two very distinct fish species assemblages occur: The Lake Malawi-Upper Shire eco-region occurs above Kapichira Falls, while the Lower Shire-Zambezi eco-region occurs below the falls.

The ESIA report indicates that since the main canal intake will be above Kapichira Falls, there is a very real risk that the SVIP canal system could provide a pathway for fish occurring in the Lower Shire-Zambezi river system to enter the Upper Shire River and thus Lake Malawi (the source of the Shire River).



**Figure D-4: Poster showing Lake Malawi Cichlids**

Lake Malawi is a globally significant and unique aquatic ecosystem, with many hundreds of fish species found nowhere else (Cichlids illustrated in Figure D-4). If the SVIP canal system were to enable invasive fish species (such as the aggressive Tigerfish *Hydrocynus vittatus*) to enter into the upper Shire River and Lake Malawi, it could have disastrous ecological consequences, including the global extinction of numerous fish species endemic to Lake Malawi.

### Fish barrier system

Accordingly, the SVIP will need a highly reliable, low-maintenance fish barrier system to prevent Tigerfish and other invasive species from entering the upper Shire River. Preliminary findings from the Technical Feasibility Study indicate that a fish weir with a vertical drop of at least 3 meters could feasibly be incorporated within the main canal design, without significantly reducing the number of hectares reached through gravity-fed irrigation in both Phases I and II.

Prior to appraisal, a fish barrier system will be specified, including the precise location, technical design, and cost estimate. This system will need to permanently and effectively prevent the entry of any other fish species into the upper Shire River above Kapichira Falls through the main canal, for as long as the canal is conveying water.

To minimize the risks from human interference (including the accidental or deliberate release of non-native fish into the canal, above the barrier), the fish barrier system would be located within the Majete Wildlife Reserve, where human access is strictly controlled. A long-term operating agreement will be needed between the Majete Reserve manager and the main canal operator regarding the surveillance, monitoring, and maintenance (as needed) of the fish barrier system.

## Majete Wildlife Reserve(MWR)

The 69,100 ha Majete Wildlife Reserve is one of Malawi's most well-managed and visited protected areas. The Reserve is presently being managed by Africa Parks, an international NGO that has a management concession from Malawi's Department of National Parks and Wildlife (DNPW). The project main canal alignments in relation to Majete Reserve and Lengwe National Park are shown in Figure D-5.

Under the revised project design, the uppermost portion of the main canal will pass through 1 km of the Reserve before continuing outside of it to the project's irrigated areas. Under the current main canal alignment and design, all portions of the canal within Majete will be either underground (as siphons), covered, fenced, or walled off as per the detailed technical design, and there will be no damage to existing Wildlife Reserve infrastructure or facilities.

Since the canal will block access to the Shire River over a relatively small section of the Reserve, the SVTP will mitigate this impact by constructing one or more nearby wildlife watering points or engineered wetlands, to be placed near the main canal (details to be confirmed with Africa Parks and DNPW). SVTP will also support the establishment of tree nurseries to enable Majete staff to restore native vegetation in certain degraded portions of the Reserve.

The Project will also have a MoU or similar agreement to reimburse Africa Parks for any damage or costs incurred, including the funding of tourism promotion during and shortly after Canal construction. An agreement is also planned between the Majete Reserve (Africa Parks and/or DNPW) and the main canal operator regarding canal fence/wall maintenance, Reserve entry and exit procedures for canal staff, and similar operational details.

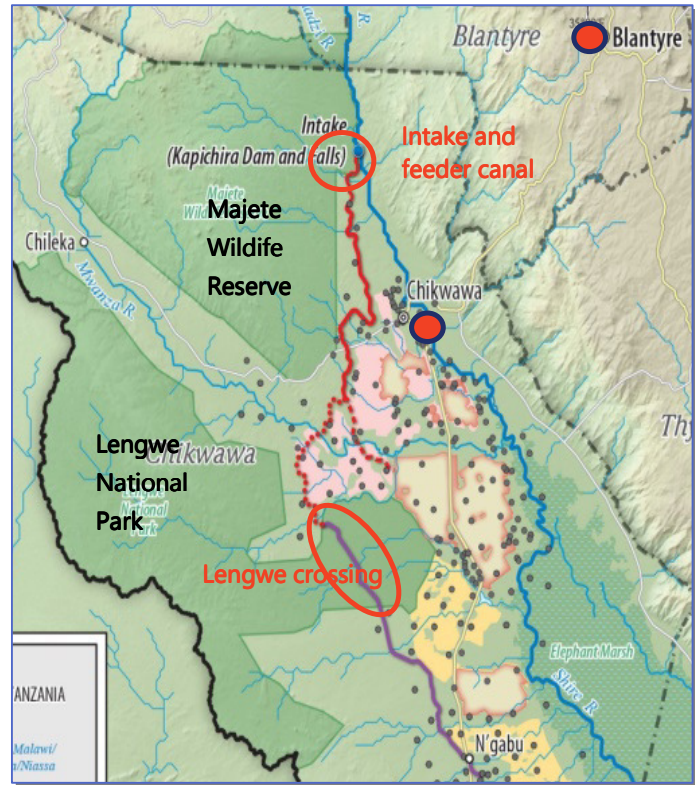


Figure D-5: Majete and Lengwe Parks and the main canals

## Lengwe National Park (LNP)

Lengwe National Park now comprises the original “Old Lengwe” portion and the recently added “New Lengwe”, totaling approximately 88,700 ha. About 13.2 km of the Bangula Canal (to be constructed during Phase II) will inevitably cross the Old Lengwe portion of LNP.

For topographical reasons, it is not feasible to re-route this portion of the canal around the Park’s boundaries as doing so would preclude gravity-fed irrigation on most of the available Phase II agricultural lands. As mitigation, the Bangula Canal will include 1:3 or gentler slopes and a non-slippery surface throughout its course within LNP so that it is wildlife-friendly and all types of animals (Figure D-6 and D-7) can traverse safely. Wildlife watering ponds and/or engineered wetlands will be established at selected points on both sides of the Bangula Canal within LNP. The number, location, and size of each pond will be determined in consultation with LNP managers. Outside LNP, similar ponds will be established to enable local people to water their livestock without entering the Park.



Figures D-6& D-7: Wildlife in the Shire Valley

The Bangula Canal service road will only connect to other roads within LNP, so irrigation service personnel and anyone else will still need to enter the Park by road through the main entrance. As part of SVTP, this main entrance road will be upgraded to an all-weather road to facilitate eco-tourism as well as access for irrigation personnel to the Bangula Canal. To compensate for the spatial footprint of the Bangula Canal within LNP, the SVTP will assist LNP with the replanting of at least 80 ha of native thicket vegetation on degraded lands within the Park. These measures will minimize the SVIP’s adverse impacts upon LNP, its natural habitats, and wildlife. Moreover, a net gain is expected from a conservation standpoint due to increased water availability for wildlife, improved year-round tourism access, and increased support from SVTP to the DNPW for LNP management.

## Mitigating project-induced pressures upon Protected Areas

Lengwe National Park, the Mwabvi Wildlife Reserve (managed by DNPW from Lengwe National Park) and Matandwe Forest Reserve (MFR, managed by the Forestry Department) are in the Lower Shire Valley, located close to the Project’s planned irrigated areas.

**SVIP will increase local demand for fuelwood, construction materials (wood, gravel, and sand) and**



The SVTP will assist the DNPW to strengthen its capacity to protect and manage both LNP (the Old Lengwe portion) and Mwabvi Wildlife Reserve. It will also help the Forestry Department to strengthen its management capacity for Matandwe Forest Reserve.

To minimize future human-wildlife conflicts, the SVTP will (in consultation with LNP managers) strengthen the game-proof perimeter fence around Old Lengwe, where needed. The Project will also incorporate a 100 m non-irrigated buffer zone around the edges of LNP (Old Lengwe), so that all SVIP-irrigated areas are further than 100 m from its boundary.

## **Elephant Marsh**

The Elephant Marsh is an extensive freshwater wetland within the floodplain of the lower Shire River. While it no longer harbors any elephants, it is an important habitat for aquatic birds and other biodiversity and its fisheries provide a livelihood for thousands of local residents.

The Elephant Marsh currently lacks formal legal protection, although with technical assistance from the ongoing, Bank-supported SRBMP, the Government is moving towards designating it as a Ramsar Wetland of International Importance. In response to seasonal flow changes in the Shire and other rivers, the Elephant Marsh annually fluctuates significantly in size.

A **long-term hydrological and ecological monitoring program** is planned to mitigate the impacts on the wetland from irrigation water abstraction. The program will be funded by SVTP, to the extent that it is not already receiving support from other sources (notably SRBMP).

The monitoring program will:

- Measure incremental changes in the Elephant Marsh as SVTP proceeds.
- Recommend adaptive management measures to the relevant Government entities.

Further mitigation will involve **ensuring adequate flows from the Ruo River**, which seasonally contributes significant volumes of the water in the Elephant Marsh. Flood management works along the Ruo River are currently under consideration, with planned support from the SRBMP Project. It is necessary to ensure that any such works are designed and operated to avoid diverting the Ruo River's flood waters away from the Elephant Marsh to avoid exacerbating the adverse impacts from the SVIP.

## Irrigation area set-aside lands

To comply with the World Bank Natural Habitats Policy (OP 4.04) and enhance environmental and social outcomes, the final layout of irrigation works and blocks will avoid any overlap with existing natural habitats and other environmentally sensitive areas, including riverine forests, natural thicket vegetation, dambos (grassy seasonal wetlands), native woodlands, 10-year floodplains, and soils unsuited for irrigation.

For Phase II, irrigation will be excluded from the 100m buffer zone around LNP, MWR and MFR. Mwabvi Wildlife Reserve and Matandwe Forest Reserve; this is intended to discourage encroachment upon these protected areas and to help reduce human-wildlife conflicts.

### Irrigation block land-use plan

- The final layout of irrigation works and blocks will avoid any overlap with existing natural habitats and other environmentally sensitive areas.
- A participative land-use planning process will inform the block cooperative boundary process and the set-aside areas (See PIM Part C2)

The non-irrigated set-aside lands will also include additional areas that are needed as woodlots or grazing lands, to adequately meet the needs of nearby human populations and thus reduce encroachment pressures on nearby protected areas to obtain fuelwood or construction materials, or to feed livestock. These non-irrigated set-aside areas will be spatially adjoining where feasible. This land-use planning process will take place under Component 2.1, described in Part C2 of the PIM.

The institutional framework for managing the set-aside lands will involve the irrigation blocks and SOCFEs, as well as traditional authorities. All Irrigated Farmer or Water User Associations to be established under SVTP must include within their by-laws, contracts, or other basic legal documents a commitment to respect whatever rules are established for public use of the set-aside lands, as well as the boundaries and key rules of nearby protected areas (particularly Lengwe, Mwabvi, and Matandwe).

To minimize damage to the terrestrial and aquatic natural habitats associated with the area's seasonal rivers (which flow into the Shire during the wet season), SVTP will use river training works only where needed at canal crossings or to protect existing infrastructure, but not to make frequently flooded lands irrigable.

## Pest Management Plan (PMP)

The completed PMP promotes integrated pest management, reduced and safer use of agro-chemicals, and maintaining acceptable water quality.

## Public health measures

SVTP includes public health measures to mitigate schistosomiasis, malaria, and other tropical disease risks typically associated with new irrigation development. The project will seek to prevent the spread of HIV-AIDS and other communicable diseases by construction workers. The project also includes complementary public health investments, including drinking water for existing villages and new housing areas.

## Canal design and construction

The canal design and planning of the construction process has assessed a wide range of potential negative impacts and mitigation measures have been defined (Table 11).

**Table D-11: Key environmental issues and mitigation measures for canal design and construction**

AIMS	MITIGATION MEASURES
<ul style="list-style-type: none"> <li>• minimize wildlife mortality</li> </ul>	⇒ section of main canal between Majete Wildlife Reserve and first SVIP irrigation block lined with a rough (non-slippery) surface, with gentler slopes, and/or animal watering ponds.
<ul style="list-style-type: none"> <li>• enable compatible human uses of water (clothes washing &amp; water collection)</li> </ul>	⇒ main canal has stairs at designated locations (staggered on either side) and signs and fences where necessary
<ul style="list-style-type: none"> <li>• decommission all project-initiated borrow pits in the best way/s possible</li> </ul>	⇒ civil works bidding documents and contracts specify the decision-making process (including local stakeholders) for how best to <b>decommission all project-initiated borrow pits</b> after they are no longer needed (many old borrow pits are more useful if they are restored to serve as animal watering ponds, rather than being drained and covered up)
<ul style="list-style-type: none"> <li>• locate construction camps, facilities, equipment staging area etc. in appropriate areas</li> </ul>	⇒ bidding documents and contracts specify the <b>locations of construction camps</b> , equipment staging areas, new borrow pits, and other ancillary facilities and ensure they are not located in inappropriate or sensitive areas
<ul style="list-style-type: none"> <li>• preserve any (physical) cultural resources that might be discovered</li> </ul>	⇒ the Chance Finds Procedures outlined in the ESIA for the construction period are incorporated into all relevant bidding documents and contracts

## Environmental and social rules for contractors

The ESMP provides environmental and social good practice rules that all SVTP contractors and construction workers are required to follow, along with strict and transparent penalties for non-compliance.

These rules prohibit contractors and workers any engaging in any

- (i) inappropriate behavior towards local residents or other people, including (but not limited to) sexual misconduct;
- (ii) hunting, wildlife capture, or bush-meat purchase
- (iii) unauthorized burning of natural vegetation;
- (iv) pollution of waterways (including by washing vehicles or other machinery maintenance too close to rivers and streams);
- (v) improper waste disposal of any kind;
- (vi) speeding or other careless driving; and
- (vii) other, defined types of environmentally and socially undesirable behavior.

Additional rules and requirements apply for canal construction within the Majete Wildlife Reserve. These are included in the EMP and are part of the Contractor's responsibilities which are overseen by wildlife and project oversight bodies (See PIM Part B for institutional arrangement). Prior to launching the civil works, a detailed agreement must be signed detailing the specific duties and responsibilities of Africa Parks/DNPW and the Supervising Engineer in the supervision of the main canal construction within the Majete Reserve. The agreement must include the criteria and procedures for issuing "stop work" orders if and when a significant problem occurs, and for resuming works after the problem is adequately addressed.

### Conservation areas and construction agreements

- Detailed agreement in works contract
- Supervision role of Africa Parks and DNPW, and Engineering Consultant.
- Specific criteria, including a 'stop-works' protocol.

The rules would include attention to:

- (i) agreed procedures to avoid conflicts with dangerous wildlife (elephants, buffaloes, crocodiles, etc.)
- (ii) agreed procedures for safe relocation of slow-moving animals (snakes, turtles, etc.) from construction areas;
- (iii) using adequate barriers around excavations to prevent wildlife from falling in;
- (iv) all solid waste must be removed from the Reserve;
- (v) no construction materials (gravel, sand, etc.) to be obtained from within the Reserve unless authorized by the Reserve Manager;
- (vi) no staging of construction equipment, washing of vehicles or machinery, or changing of lubricants within the Reserve;
- (vii) rock blasting can only take place during 11am-2pm, with 1 day+ notice to Reserve managers, and never on weekends or holidays; mobile sound barriers (as described in the ESIA) must be used

- (viii) a reporting mechanism for all non-compliance and any wildlife incidents
- (ix) sensitization and training of all construction workers before their first day of work within the Reserve.

Communities will also need to be sensitized to the potential risks of the influx of temporary workers for the works phase of the project, and encouraged and informed on how to use the GRM if issues arise between workers and community members. This will be implemented by the GRM technical assistance consultant.

Rigorous pre-selection vetting is needed to assess the environmental management capacity and commitment of the main civil works contractor for construction within Majete (whether or not the contract is separate from the remaining canal construction). DNPW and/or Africa Parks will have an explicit role in the selection process.

## **3.4 Additional Safeguards Policies**

### **Trans-boundary water**

Riparian Notification Letters have been sent to the governments of all the other Zambezi River Basin countries (Mozambique, Tanzania, Angola, Botswana, Namibia, Zambia, and Zimbabwe) and the Zambezi River Commission Technical Secretariat, since the Shire Basin forms part of the larger Zambezi Basin. This notification and request for any official comments is done to support information-sharing among the riparian countries, and complies with Projects in International Waterways OP7.50. The team assessed that the Project's impacts will not cause appreciable harm to any riparian neighbors.

### **Dam safety**

The investments will not include any dams, but the intake will be located near Kapichira Dam, and is dependent for its functioning on this dam. The World Bank's Safety of Dams Policy (OP4.37) thus applies, and dam safety assessment was carried out by an independent panel of dam experts, which noted only minor issues which have been taken on board by the dam operator EGENCO (formerly ESCOM).

# 4. Grievance Redress Mechanism

## 4.1 Project-level Grievance Redress Mechanism

The project-level Grievance Redress Mechanism (GRM) will be targeted at primary beneficiary communities and managed by an independent civil organization. It will outline in detail the acceptable ways in which individuals can have a voice and express their concerns, as well as the ways in which these concerns will be addressed and monitored. **The detailed GRM is provided in the Resettlement Policy Framework (RPF).**

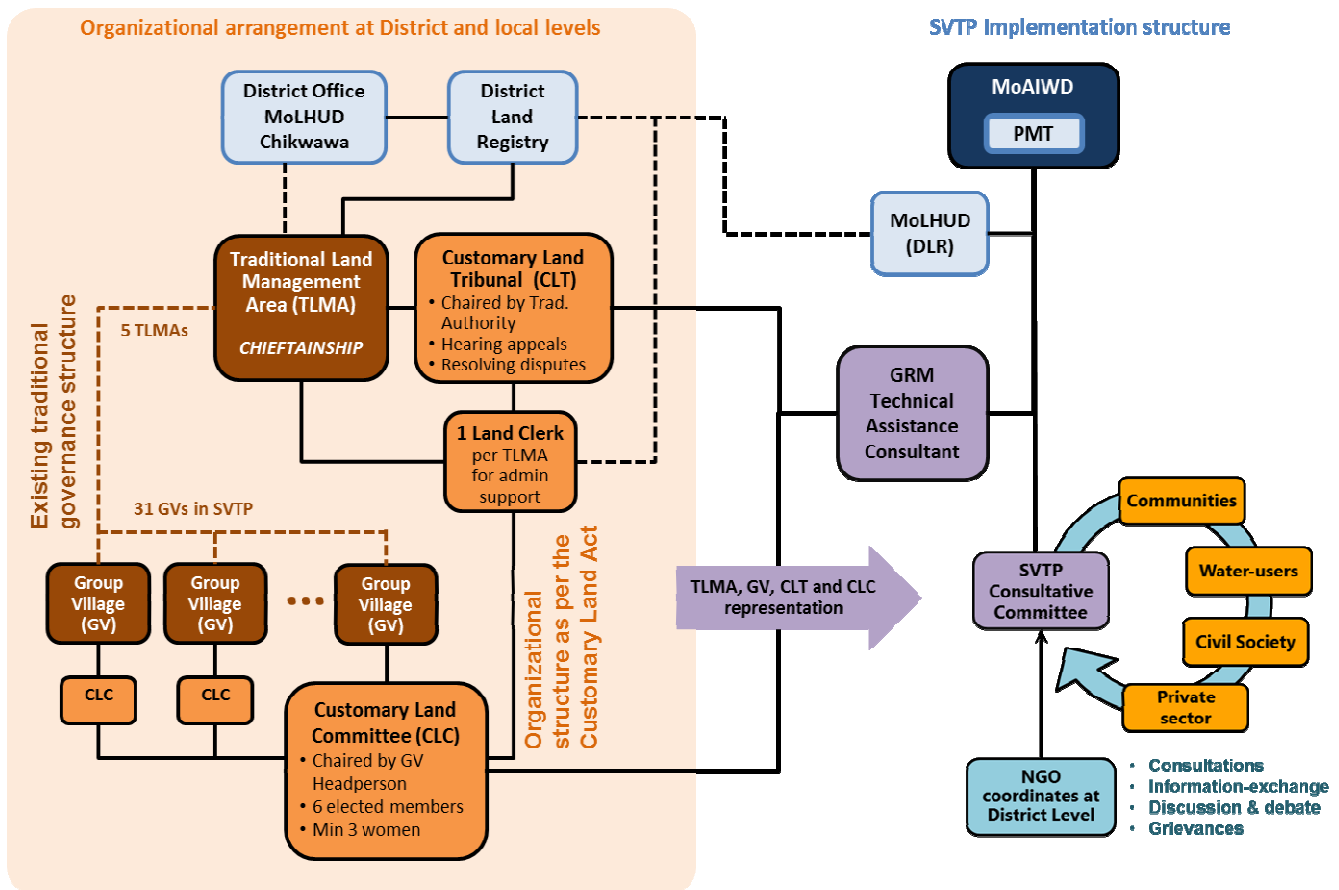


Figure D-8: Organizational structure supporting the Grievance Redress Mechanism

The GRM will facilitate the timely resolution of program-related grievances. It will also support local arrangements for the resolution of grievances and land tenure disputes, based on the proposal formulated during project preparation. Support will be provided to the new Land Tribunals and the District Consultative Committee discussed in Part B. The people involved (e.g. village chiefs, GV committees, Traditional Authorities (TA) and District Authorities) will depend on the characteristics of the (potential) conflicts. As evidenced during the preparation phase, local mechanisms are successful in solving land tenure disputes which involve inhabitants from the same area.

**Details of the legal frameworks, the community engagement process, and the linkages with agricultural development in Component 3, are provided in the PIM Part C2.**

## 4.2 World Bank Grievance Redress

Communities and individuals who believe that they are adversely affected by a WB-supported project may submit complaints to existing project-level grievance redress mechanisms (GRMs) or the WB's **Grievance Redress**

The GRS ensures that complaints are promptly reviewed in order to address project-related concerns. Project-affected communities and individuals may submit their complaint/s to the WB's independent **Inspection Panel**, which determines whether harm did or could occur as a result of WB non-compliance with its policies and procedures. Complaints may be submitted at any time after concerns have been brought directly to the World Bank's attention and Bank Management has been given an opportunity to respond.

Information on how to submit complaints to the World Bank's **corporate GRS**:  
<http://www.worldbank.org/en/projects-operations/products-and-services/grievance-redress-service>

Information on how to submit complaints to the World Bank **Inspection Panel**:  
[www.inspectionpanel.org](http://www.inspectionpanel.org)