

FEASIBILITY STUDY

FOR

GALVANIZING PRODUCTS LIMITED

Project for

**THE ESTABLISHMENT OF FACILITIES FOR NAILS, WIRE AND
GALVANIZE ROOFING. MANUFACTURING FACILITIES**

Prepared by:
GALVANIZING PRODUCTS LIMITED
P.O. Box 3030
DAR-ES-SALAAM

1.0 INTRODUCTION

The Tanzania Government is emphasizing on its long-term industrial plan of strengthening its Manufacturing Sector and The private sector has also been paying a vital role in the development of the Manufacturing sector. One of the necessities for the Promotion of manufacturing industry is the availability of an adequate local market for its output. It is a rational for our Government, therefore, to encourage and promote the growth of the manufacturing sector which will ultimately bring the desired economic growth in our country.

GALVANIZING PRODUCTS LIMITED has realized the potential this country has in the manufacturing sector especially in the line of Nails, Wire and Galvanize Roofing. It is now contemplating establishing manufacturing facilities for Nails, Wire and Galvanize Roofing.

Objective of Study

The purpose of this feasibility study is to work out the technical and commercial details and financial viability for the establishing manufacturing facilities for Nails, Galvanize Roofing and Wire plant.

1.1 Project Promoter

The project is being promoted by **Galvanizing Products Limited** of P.O. Box 3030 Dar-es-salaam

2.0. EXECUTIVE SUMMARY

2.1 INTRODUCTION

This study examines the possibility for the establishment of manufacturing facilities for manufacturing facilities for Nails, Wire and Galvanize Roofing. Techno-economic evaluation has been carried out to determine the viability of the project idea.

2.2 Market and Marketing Aspects

The market survey carried out reveals that the demand for Nails, Wire and Galvanize Roofing products is raising rapidly due to the increase of construction activities.

2.3 Location

The plant is located at plot no 35 Mikocheni Light Industrial Area, Kinondoni Dar-es-salaam

Manpower Requirements

The company will employ about 50 workers. The plant will operate on a 3-shift per day.

2.4 Implementation

The Major activities include registration and approval of the project by the Tanzania Investment Centre .Ordering of machineries, Civil works design, tendering and construction of

the warehouse for the factory will be carried out immediately after project is approved and would take about one year.

Machinery will be ordered after funds are committed. These will be fabricated, shipped for activities related to machinery up to their receipt at site.

Training, machinery installation and commissioning will be undertaken within another two months.

Activities related to civil works and machinery will take place simultaneously.

2.5 THE PROJECT

Capital Investment Requirements

US\$

DESCRIPTION	LOCAL	TOTAL
Land and Building	100,000	100,000
Plant & Machinery	600,000	600,000
Furniture & Fitting	50,000	50,000
Vehicles	200,000	200,000
Pre-Operational Expenses	50,000	50,000
Others	350,000	350,000
Working Capital	200,000	200,000
TOTAL INVESTMENT	1,550,000	1,550,000

2.6 Financing Scheme

US\$

Equity	1,550,000	1,550,000
Total	1,550,000	1,550,000

2.7 Recommendations

The study shows that the intended project is both technically and financially feasible. Furthermore, it will cut down on imports of this important product. In view of the findings the project is recommended for implementation.

3.0 MARKET AND MARKETING

3.1 Product

The products which this project is going to produce are Nails, Wire and Galvanize Roofing.

3.2 Demand

Demand for the proposed products have been derived on the basis of the end use method. The products are used in various ways from buildings and other civil work constructions. So far the demand for the Nails, Wire and Galvanize Roofing has been increasing and the company saw a need to establish such manufacturing facilities. With the current improvements in the national economy, it is expected that the average capacity utilization will raise from 50% to 95% in the fifth year

3.3 Supply

There exist numerous factories which supply **Nails, Wire and Galvanize Roofing**. There are also some quantities being imported showing that there is still huge demand in the country. The increasing trend of demanded Imported products emphasises the need to establish such industry.

3.4. Demand – Supply gap and Plant Capacity

There exists the project demand-supply gap for Nails, Wire and Galvanize Roofing in Tanzania for the promoters' intention to put up a plant with capacity to produce 6000 tons of various sizes of the products in question.

3.5. Distribution Channels

The products can be easily distributed to final consumers either directly (one level channel) to final consumers or by using only one intermediary who will resale to final consumers (two level channel). The company will continue using its existing distribution channels and may also invite more agents as the plant expands considerably.

3.6. Promotion

The Experience gained of selling these products, it prescribes that they can be easily sold through personal selling (personal solicitations of orders) to potential big customers and advertisement with emphasis on product availability, quality and persuasion.

4.0 Environment Protection

The amount of hazardous waste will be very small especially because only cleaned raw materials will be used. There is therefore no environmental hazardous waste expected from this project.

5.0 Plant Location and Civil Works

The project will be carried in the plant which is located at plot no.35 Mikocheni Light Industrial Area, Kinondoni Dar-es-salaam

Utility Services

a) Water

The site has already been supplied with water. A three-inch diameter pipeline connects the plot to the main pipeline. The plant water requirement is basically for cooling purposes.

b) Electricity

The site will tap its power from substation nearby. Power is consumed in very large quantities and it is among the biggest cost element in this type of production. The demand for this plan is estimated at around 3000kv

c) Weighing Scales

A road vehicle weigh bridge and a portable dial platform scale will be required at the plant site for weighing incoming trucks with raw materials and weighing the production inputs during production.

d) Workshop Facility

In order to enable the company handle repairs to its assets the acquisition of metal working machines such as one lathe, a milling/drilling machine, power hacksaw and tool kit is recommended

6.0 MANPOWER AND ORGANISATION

The proposed project for Nails, Wire and Galvanize Roofing. Plant complex will have the following organisation structure

6.1. Manpower Requirement

The manpower requirement for running the proposed project is 50 people. The administration staff will work on one shift per day. The production and technical departments will work on 3 shifts per day basis.

7.0 INVESTMENT AND FINANCING

7.1 Assumptions

The financial projections to determine the viability of the Nails, Wire and Galvanize Roofing project are based on the following key assumptions:

- The project will operate at 50% capacity in year 1, 60% in year 2, 70% in year 3 from year 4 and thereafter.
- Plant will operate on three shifts per day for 250 days per year.
- The whole project output will be sold locally.
- The project has adopted the currency exchange rate of United state Dollar (US\$.) 1 = Tshs. 2300

7.2 Summary of Capital Costs

The total initial investment required for undertaking the project is estimated at US\$. 1.55 million. The breakdown of the capital investments is presented in table below: -

DESCRIPTION	LOCAL	TOTAL
Land & Buildings	100,000	100,000
Plant, Machinery & Equipment	600,000	600,000
Vehicles	200,000	200,000
Furniture & Fittings	50,000	50,000
Others	350,000	350,000
Pre operational Expenses	50,000	50,000
Initial Working Capital	200,000	200,000
Grand Total	1,550,000	1,550,000

7.3 Buildings and Civil Works Costs

The premises will be constructed for the plant to be installed. These are estimated and given under cost of machinery.

7.4 Plant Machinery and Equipment Costs

The main machinery for the envisaged project will be Nails, Wire and Galvanize Roofing plant and various tools, accessories etc,

7.5 Furniture and Fittings

The items to be purchased will comprise office furniture and computers for office for the factory.

7.6 Vehicles

A 15-toner truck and a 5-toner truck that will be used for transportation of raw materials and finished products and other

office activities are recommended. A bus of 45 seats will be provided for workers' transport.

7.8 Pre-Production Capital Expenditures

These include project development cost for feasibility study and start-up expenses.

7.9 Initial Working Capital

Initial working capital requirements for the proposed steel mill project works out at about US\$.0.20 million

8.0 COST OF OPERATION

The anticipated costs for operating the project is estimated to be 60% of the operations costs . the capacity utilization has been assumed to grow at a rate of 50% in year 1, 60% in year 2, 70% in year 3 while stabilized production is envisaged from the fourth year at 80% of rated capacity. 80% will be the sustainable production level.

8.1 Repair and Maintenance

Annual repairs and maintenance of the machinery and equipment have been worked out to cover all costs, including spare parts

Vehicle running Expenses.

Vehicle running expenses include fuel, lubricants, tear and wear, road licence, insurance, etc.

8.2 Administrative Overheads

The main item in the administrative cost is insurance of fixed assets.

9.0 FINANCIAL ANALYSIS

9.1 Income

The proposed Nails, Wire and Galvanize Roofing project expects to earn its income through the sale its products mainly at sustainable level of production, the total sales are expected to stand at US\$2.0 Million from the fourth year of production onwards.

9.2 Cash Flow statement

The project's cash flow is impressive as the need for external assistance arises only in the initial stages of the project investment.

9.3 Economic Benefits

The successful operation of this project will contribute significant economic benefits to Tanzania as whole. In summary the benefits which will be realized are as follows: -

- The execution of this project will bring about employment opportunities.
- Provision of income to other services providers, thus contributing to the reduction of poverty. The income to be earned will help in improving standard of living of the workers and other people.

- The direct income for the workers, combined with other social benefits that the Management will provide, will help in overall efforts of alleviation of poverty in the Region.
- The project will facilitate opportunities to increase foreign exchange earnings through export of some of its value products.
- Project will create Government Revenue through Taxation

10.0 Conclusion

The investment and development of these products processing undertaking is in line with the Government objective of encouraging proper development of industries in the country.

In addition, it will have a positive impact on the development of the region, as it would generate a number of benefits and more positive impact on the economy of the region. It will also have forward and backward linkages. This document has provided a full analysis and has established that the proposed project is technically sound, financially viable, and economically/socially beneficial.

GALVANIZING PRODUCTS LIMITED**INVESTMENT COST US\$**

DESCRIPTION	LOCAL	TOTAL
Land and Building	100,000	100,000
Plant & Machinery	600,000	600,000
Furniture & Fitting	50,000	50,000
Vehicles	200,000	200,000
Pre-Operational Expenses	50,000	50,000
Others	350,000	350,000
Working Capital	200,000	200,000
TOTAL INVESTMENT	1,550,000	1,550,000

GALVANIZING PRODUCTS LIMITED

PROJECT FINANCING

US\$

DESCRIPTION	LOCAL	TOTAL
Equity	1,550,000	1,550,000
TOTAL INVESTMENT	1,550,000	1,550,000

GALVANIZING PRODUCTS LIMITED

DEPRECIATION SCHEDULE

US\$

	Rate		1	2	3	4	5	6	7	8	9-10
Land & Buildings	4%	100,000	4000	4000	4000	4000	4000	4000	4000	4000	4000
Plant & Machinery	12.5%	600,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000
Furniture & Fitting	12.5%	50,000	6250	6250	6250	6250	6250	6250	6250	6250	
Vehicles	25%	200,000	50000	50000	50000	50000	50000	50000	50000	50000	50000
Pre operational Expenses	20%	50,000	10000	10000	10000	10000	10000				
Total			145,250	145,250	145,250	145,250	145,250	135,250	135,250	135,250	135,250

GALVANIZING PRODUCTS LIMITED

PROJECTED PROFIT & LOSS STATEMENT

US\$000

	1	2	3	4	5	6	7	8	9	10
	60%	80%	90%							
TURNOVER Nails, wire and Galvanize Roofing products	1200	1600	1800	2,000	2,000	2,000	2,000	2,000	2,000	2,000
	1200	1600	1800	2,000	2,000	2,000	2,000	2,000	2,000	2,000
DIRECT COSTS	720	960	1080	1200	1200	1200	1200	1200	1200	1200
Total Direct Cost	720	960	1080	1200	1200	1200	1200	1200	1200	1200
GROSS PROFIT	480	640	720	800	800	800	800	800	800	800
OTHER COSTS Depreciation	145	145	145	145	145	135	135	135	135	135
Profit before tax	335	445	575	655	655	655	655	655	655	655
OPERATING PROFIT	335	445	575	655	655	655	655	655	655	655
Taxation 30%	101	134	173	200	200	200	200	200	200	200
NET PROFIT	234	311	402	455	455	455	455	455	455	455
CUMULATIVE	234	545	947	1402	1857	2312	2,767	3,222	3,677	4,132

