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Submitted to

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SULTANATE OF OMAN

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PROJECT PROFILE FOR SETTING UP A
STEEL WIRE DRAWING UNIT
FOR MANUFACTURE OF
BINDING WIRES

CONTENTS

1. PROJECT BRIEF

This report relates to a study on the feasibility of setting up a Steel Wire Drawing unit in Sultanate of Oman for manufacturing Binding wires used in the construction sector. The following is the Brief illustration of the project:

Name of Product		**Binding Wires**
Domestic Market Potential (as of 2021)		7,300 Tons per Annum
Export Potential in target markets		93,827 Tons per Annum
Export Target Markets		GCC Countries
Capacity of the Project		816 tons per Annum
Total Investment		RO 174,000
Equity Investment		RO 69,600
Key Appraisal Criteria:		
IRR on total investment		15.51%
IRR on Equity		30.55%
Payback period of Total Investment		6 years 2 months
Payback period on equity		3 Years 1 month
Break Even Point (as % of Capacity)		66.7%
Cash Break Even Point (as % of Capacity)		61.6%
Debt Equity Ratio		1.5:1
DSCR		2.83
Manpower	Total	14
	Nationals	5

2. GENERAL INDUSTRY ANALYSIS

2.1. OVERVIEW OF CONSTRUCTION SECTOR IN OMAN

The following table illustrates the trend in the growth of the construction sector GDP during 2010 to 2020.

Details	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
GDP (RO million)	21,935	26,152	29,458	30,292	31,174	26,500	25,354	27,216	35,184	33,859	28,442
Construction GDP (RO Million)	1,314	1,390	1,747	1,803	1,904	2,067	2,285	2,080	3,258	3,202	2,623
Growth Rate (%)	6%	6%	26%	3%	6%	9%	11%	-9%	57%	-2%	-18%
Construction / Total GDP (%)	6%	5%	6%	6%	6%	8%	9%	8%	9%	9%	9%

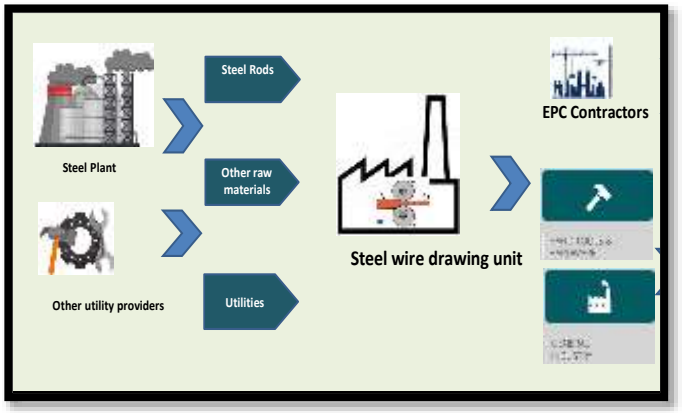
Source: NCSI Statistical Year Book 2021

As it can be seen from the table above:

- The construction sector contribution to the GDP has consistently grown till 2018.
- However, with limited new projects being executed it has witnessed a slide during 2019 and 2020.
- The Construction sector GDP was around 2,623 million in 2020 which comprises to about 9% of the total GDP of Oman.

2.2. VALUE-CHAIN OF WIRE PRODUCTS AND USES

The following chart illustrates the overall value chain of Wire Drawing Unit:



2.3. VALUE CHAIN IN OMAN

2.3.1. Upstream Value Chain activities

The raw material for drawing wires is steel rods. Iron ore is currently mined in about 50 countries globally, majorly from Brazil, China, India, Russia, USA and Australia. Following are some of the upstream Iron steel players in the Sultanate:

- **Jindal Shadeed Iron & Steel LLC. (JSIS)** located in Sohar, operates a 1.8 MTPA Direct Reduced Iron (DRI) Plant which was established in 2010. The company established a Steel Making Shop in 2014 having a capacity of 2.4 MTPA. Jindal Shadeed also operates a 1.4 MTPA Rebar Rolling Mill which was established in 2016.
- **Sohar Steel LLC** located in Sohar Industrial Port is capable of producing 600,000 MT of Steel Billets and 500,000 MT of Re-bars annually.

2.3.2. Downstream Value Chain activities

The products find application in all the steel wire related activities including wires for tyres, hoses, galvanized wire and strands, ACSR strands and armoring of conductor cables, springs, fasteners, clips, staples, mesh, fencing, screws, nails, barbed wire, chains etc.

2.4. ENABLERS IN VALUE CHAIN IN OMAN

World class infrastructure and utilities are provided by Madayn for establishing industrial units in Oman.

2.5. HURDLES IN VALUE CHAIN IN OMAN

- High labor cost
- Comparatively low local demand but can be addressed if the proposed project targets GCC countries.

2.6. SWOT ANALYSIS

SWOT ANALYSIS	
Strengths	**Weaknesses**
• Low-technology manufacturing which can be effectively adopted by a Small Industry • Cheaper Land Rentals / Utilities	• Rising input costs • Lower scale of operations / Low capacity
Opportunity	**Threats**
• Product Acceptance • Demand from Infrastructure projects & Buildings • Potential for exports	• Fluctuations in RM cost • Fluctuations in demand • Competition from cheaper imports

3. MARKET ANALYSIS

3.1. PRODUCT USES & APPLICATIONS

Binding Wires is used for binding reinforcement in construction. Binding Wire is also called annealed wire. Binding wire is used for the purpose of tying applications in the field of construction.

Binding wire is used for binding reinforcement slabs, metal mesh processing, beams, walls, columns and so one. In particular, it is used in concrete construction. Binding wire shall provide a secure hold for reinforcing bars of different diameters.

To install fences and barriers, binding wire is used for making ropes, cables, springs, nails and electrodes. Through a combination of flexibility and strength of binding wire bonding is indispensable for the various elements of structures, and strengthen ceilings.

Binding wires is also used in various industries for packing finished products. It is also used for the production of welded wire mesh and for the manufacture of barbed wire. Barbed wire is made of knitting nets with a diameter of 1.4 mm – 2.8 mm.

3.2. GLOBAL MARKET OUTLOOK

Steel wire drawn products is internationally classified under HS code:

- **721710** - Wire of iron or non-alloy steel, in coils, not plated or coated, whether or not polished (excluding bars and rods)
- **721720** - Wire of iron or non-alloy steel, in coils, plated or coated with zinc (excluding bars and rods)
- **721730** - Wire of iron or non-alloy steel, in coils, plated or coated with base metals (excluding plated or coated with zinc, and bars and rods)
- **721790** - Wire of iron or non-alloy steel, in coils, plated or coated (excluding plated or coated with base metals, and bars and rods)

3.2.1 Major Global Exporters

The table below details the major exporting countries of steel wire in both quantity and Value for the last 5 years

Rank	Exporting Countries	Value/ Quantity	2017	2018	2019	2020	2021
1	China	USD ('000)	1,395,100	1,707,903	1,856,163	2,165,838	3,313,756
		Ton	1,583,716	1,612,274	1,594,366	1,604,160	1,430,774
		USD/Ton	881	1059	1164	1350	2316
2	Italy	USD ('000)	407,352	524,029	532,978	521,929	835,961
		Ton	492,752	576,277	680,165	725,891	800,775
		USD/Ton	827	909	784	719	1044
3	Germany	USD ('000)	493,580	554,372	442,899	380,859	528,854
		Ton	449,904	434,668	382,262	351,497	371,013
		USD/Ton	1097	1275	1159	1084	1425
4	Czech Republic	USD ('000)	288,225	354,117	325,983	313,976	435,381
		Ton	327,323	344,716		340,784	349,920
		USD/Ton	881	1027		921	1244
5	Turkey	USD ('000)	170,567	297,604	254,991	185,648	292,314
		Ton	226,527	349,140	337,375	253,956	281,308
		USD/Ton	753	852	756	731	1039
6	Belarus	USD ('000)	174,961	210,059	171,524	163,590	246,566
		Ton	288,998	306,134	262,847	276,136	281,001
		USD/Ton	605	686	653	592	877
7	Netherlands	USD ('000)	59,609	108,184	83,796	95,969	206,105
		Ton	75,672	101,599	92,885	144,519	277,542
		USD/Ton	788	1065	902	664	743
8	Russian Federation	USD ('000)	145,751	208,413	197,256	147,327	242,719
		Ton	237,918	306,627	316,106	265,740	271,429
		USD/Ton	613	680	624	554	894
9	Korea, Republic of	USD ('000)	379,455	391,991	359,852	307,869	399,431
		Ton	293,428	285,150	267,919	233,954	250,996
		USD/Ton	1293	1375	1343	1316	1591
10	Slovakia	USD ('000)	268,106	309,127	271,643	272,435	390,626
		Ton	223,541	222,371	213,674	220,248	250,124
		USD/Ton	1199	1390	1271	1237	1562

Source: UN Com Trade Data

3.2.2 Major Global Importers

The table below details the major importing countries of steel wire in both quantity and Value for the last 5 years

Rank	Importing countries	Value/ Quantity	2017	2018	2019	2020	2021
1	United States of America	USD ('000)	628,234	620,767	516,604	484,777	731,521
		Ton	604,781	522,594	450,934	436,026	520,792
		USD/Ton	1039	1188	1146	1112	1405
2	Germany	USD ('000)	484,469	569,919	505,721	438,784	582,854
		Ton	539,139	554,895	529,182	489,593	481,624
		USD/Ton	899	1027	956	896	1210
3	Poland	USD ('000)	264,229	364,968	322,300	277,996	419,901
		Ton	334,617	387,788	367,655	322,727	365,931
		USD/Ton	790	941	877	861	1147
4	France	USD ('000)	287,275	343,007	314,339	288,530	441,068
		Ton	306,181	315,498	309,607	303,672	349,833
		USD/Ton	938	1087	1015	950	1261
5	Switzerland	USD ('000)	167,605	223,852	186,562	183,152	257,762
		Ton	209,807	246,803	231,944	248,512	238,444
		USD/Ton	799	907	804	737	1081
6	Thailand	USD ('000)	173,003	210,635	209,701	180,201	266,569
		Ton	159,037	180,127	191,853	182,366	202,890
		USD/Ton	1088	1169	1093	988	1314
7	Korea, Republic of	USD ('000)	143,983	160,664	176,348	154,881	202,228
		Ton	174,867	168,849	213,280	199,244	199,703
		USD/Ton	823	952	827	777	1013
8	Romania	USD ('000)	123,554	165,216	148,158	150,730	222,044
		Ton	113,870	148,005	140,888	189,387	180,810
		USD/Ton	1085	1116	1052	796	1228
9	Japan	USD ('000)	203,654	212,640	229,516	186,402	227,212
		Ton	186,073	180,921	207,733	174,177	177,313
		USD/Ton	1094	1175	1105	1070	1281
10	Brazil	USD ('000)	116,581	145,904	128,570	107,767	235,431
		Ton	80,644	90,247	88,581	75,853	166,055
		USD/Ton	1446	1617	1451	1421	1418

Source: UN Com Trade Data

3.3. ESTIMATE OF DOMESTIC DEMAND

3.3.1. Local Production

Steel wire drawing units are present in Oman to meet the local demand. The major players in Oman market is as detailed below. However, it is to be noted that these players have their in-house wire drawing facilities catering mainly to their captive requirements.

S. No	Name of the Company
1	Universal Wires LLC
2	Chainlink Fencing Co. LLC.
3	Al Kiyumi Global LLC
4	Muscat Industrial Company LLC - Omani Nails
5	Seagull Al Batinah International LLC
6	Nuhas Oman LLC
7	Oman Cables Industry SAOG

3.3.2. Foreign Trade

Steel Wire is categorized under the following HS Codes:

- **HS 72171000 -** Wire of iron or non-alloy steel, not plated or coated, whether or not polished.
- **HS 72172000 -** Wire of iron or non-alloy steel, plated or coated with zinc
- **HS 72173000 -** Wire of iron or non-alloy steel, plated or coated with base metals other than zinc.
- **HS 72179000 -** Other Wire of iron or non-alloy steel.

3.3.2.1.Import Trade Data of Oman

The table below details the imports of Steel wires into Oman under the following HS Codes with quantities, values and country of origin.

- **HS Code : 72171000**

Imported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72171000	Value in RO	6,105,590	7,103,038	6,108,646	3,292,141	4,462,597	4,444,591	10,944,771
	Quantity in Tons	25,297	32,241	23,715	10,317	19,711	22,806	39,180
	Value in RO/Ton	**241**	**220**	**258**	**319**	**226**	**195**	**279**

Source: ROP Statistics 2021

Country of Origin	Value (RO)	Quantity (Kg)	RO / Ton	% of Total
United Arab Emirates	6,687,277	23,269,359	287	59.39%
Iraq	3,150,028	12,409,412	254	31.67%
Saudi Arabia	427,360	1,470,482	291	3.75%
China	228,543	707,560	323	1.81%
Turkey	176,928	450,908	392	1.15%
Iran, Islamic Republic	98,429	355,268	277	Less than 1%
India	109,736	317,104	346	
Korea, Republic of South Korea	45,036	148,800	303	
Tunisia	9,594	25,700	373	
Qatar	11,471	25,076	457	
United States	19	107	178	
Germany	350	-		
Total	**10,944,771**	**39,179,776**	**279**	100.00%

Source: ROP Statistics 2021

As it can be seen from the above table the major imports in 2021 are from UAE and Iraq comprising of about 59% and 32% of the total imports into Oman.

- **HS Code : 72172000**

Imported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72172000	Value in RO	10,215,851	9,303,921	11,908,723	23,272,996	8,823,221	5,877,104	5,656,337
	Quantity in Tons	39,364	36,970	40,320	58,693	27,972	19,923	14,722
	Value in RO/Ton	**260**	**252**	**295**	**397**	**315**	**295**	**384**

Source: ROP Statistics 2021

Country of Origin	Value (RO)	Quantity (Kg)	RO/Ton	% of Total
China	2,761,949	7,829,115	353	53%
United Arab Emirates	1,580,860	3,894,249	406	26%
Turkey	654,707	1,411,840	464	10%
Italy	452,514	976,126	464	7%
India	108,115	304,564	355	2%
Qatar	40,125	125,918	319	1%
Korea, Republic of South Korea	30,729	108,000	285	1%
Saudi Arabia	24,058	64,993	370	Less than 1 %
Oman	2,908	6,641	438	
South Africa	321	400	803	
Oman Freezone	49	50	980	
Total	**5,656,335**	**14,721,896**	**384**	100%

Source: ROP Statistics 2021

As it can be seen from the above table the major imports are from China, UAE and Turkey comprising of about 89% of the total imports into Oman.

- **HS Code : 72173000**

Imported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72173000	Value in RO	32,619	118,597	96,277	709,865	264,418	684,528	561,353
	Quantity in Tons	71	334	275	2,032	420	1,946	856.491
	Value in RO/Ton	**461**	**356**	**350**	**349**	**630**	**352**	**655**

Source: ROP Statistics 2021

Country of Origin	Value (RO)	Quantity (Kg)	RO/Ton	% of Total
China	352,092	516,209	682	60%
Korea, Republic of (South Korea)	70,611	144,280	489	17%
United Arab Emirates	93,056	119,523	779	14%
India	29,431	54,024	545	6%
France	14,764	22,134	667	3%
Netherlands	23	115	200	Less than 1%
Germany	903	106	8519	
Qatar	216	74	2919	
Italy	256	26	9846	
Total	**561,352**	**856,491**	**655**	100%

Source: ROP Statistics 2021

As it can be seen from the above table the major imports are from China, Korea, UAE, India and France.

- **HS Code: 72179000**

Imported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72179000	Value in RO	330,556	114,480	486,621	736,540	540,593	205,845	1,286,237
	Quantity in Tons	1,344	604	1,348	1,919	1,786	1,165	6,964
	Value in RO/Ton	**246**	**190**	**361**	**384**	**303**	**177**	**185**

Source: ROP Statistics 2021

Country of Origin	Value (RO)	Quantity (Kg)	RO / Ton	% of Total
United Arab Emirates	493,409	4,207,993	117	60%
Iraq	405,930	1,334,961	304	19%
China	135,393	858,100	158	12%
Saudi Arabia	144,801	338,377	428	5%
India	59,623	80,383	742	1%
Turkey	19,358	78,873	245	1%
Qatar	9,763	25,179	388	Less than 1%
Spain	10,144	24,900	407	
Iran, Islamic Republic of	886	8,300	107	
Pakistan	3,422	5,582	613	
Bahrain	3,383	996	3397	
Belgium	36	37	973	
United States	14	25	560	
Germany	75	6	12500	
Total	**1,286,237**	**6,963,712**	**185**	

Source: ROP Statistics 2021

As it can be seen from the above table the major imports are from UAE, Iraq and China.

3.3.2.2.Summary of Imports into Oman

The table below details the total Imports into Oman for the last 7 years.

Imported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72171000	Value in RO	6,105,590	7,103,038	6,108,646	3,292,141	4,462,597	4,444,591	10,944,771
	Quantity in Tons	25,297	32,241	23,715	10,317	19,711	22,806	39,180
	Value in RO/Ton	241	220	258	319	226	195	279
72172000	Value in RO	10,215,851	9,303,921	11,908,723	23,272,996	8,823,221	5,877,104	5,656,337
	Quantity in Tons	39,364	36,970	40,320	58,693	27,972	19,923	14,722
	Value in RO/Ton	260	252	295	397	315	295	384
72173000	Value in RO	32,619	118,597	96,277	709,865	264,418	684,528	561,353
	Quantity in Tons	71	334	275	2,032	420	1,946	856
	Value in RO/Ton	461	356	350	349	630	352	655
72179000	Value in RO	330,556	114,480	486,621	736,540	540,593	205,845	1,286,237
	Quantity in Tons	1,344	604	1,348	1,919	1,786	1,165	6,964
	Value in RO/Ton	246	190	361	384	303	177	185
Total Imports	**Value in RO**	**16,684,616**	**16,640,036**	**18,600,267**	**28,011,542**	**14,090,829**	**11,212,068**	**18,448,698**
	Quantity in tons	**66,077**	**70,148**	**65,659**	**72,962**	**49,889**	**45,840**	**61,722**
	Value in RO/Ton	**253**	**237**	**283**	**384**	**282**	**245**	**299**

Source: ROP Statistics 2021

Based on all the above HS Codes, the total quantity imported into Oman for year 2021 was 61,722 tons.

3.3.2.3.Export Trade Data of Oman

The table below details the imports of Steel wires into Oman under the following HS Codes with quantities, values and country of origin.

- **HS Code : 72171000**

Exported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72171000	Value in RO	983,409	763,055	50,374	16,329	186,838	34,430	6,604
	Quantity in Tons	1,151	4,174	285	36	890	164	10
	Value in RO/Ton	**854**	**183**	**177**	**454**	**210**	**211**	**632**

Source: ROP Statistics 2021

Export Destinations	Value (RO)	Quantity (Kg)	RO/Ton
Qatar	6,604	10,453	631.78

Source: ROP Statistics 2021

The total exports of steel wires under the above mentioned HS code was only 10 tons in 2021 and was exported to Qatar.

- **HS Code : 72172000**

Exported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72172000	Value in RO	6,021,658	5,312,630	4,071,124	203,747	2,336,727	4,400,872	9,898,918
	Quantity in Tons	22,409	19,805	13,444	705	9,661	16,151	26,219
	Value in RO/Ton	**269**	**268**	**303**	**289**	**242**	**272**	**378**

Source: ROP Statistics 2021

Export Destinations	Value (RO)	Quantity (Kg)	RO/Ton	% of Total
United Arab Emirates	5,201,812	12,649,964	411	48%
Qatar	2,142,848	7,159,468	299	27%
United States	1,091,138	2,697,208	405	10%
South Africa	306,207	986,500	310	4%
United Kingdom	396,737	823,257	482	3%
Tunisia	232,868	531,500	438	2%
Kenya	98,560	320,000	308	1%
Bahrain	123,027	304,814	404	1%
Ghana	42,620	108,000	395	Less than 1%
Pakistan	10,340	106,000	98	
Cyprus	45,219	105,884	427	
India	31,431	104,000	302	
Morocco	62,100	54,000	1150	
Yemen	19,431	51,991	374	
Saudi Arabia	22,722	49,911	455	
Jordan	24,221	48,959	495	
Oman	11,710	30,000	390	
Syrian Arab Republic	13,569	26,500	512	
Mexico	9,960	26,000	383	
Egypt	11,406	25,000	456	
Denmark	992	10,200	97	
Total	**9,898,918**	**26,219,156**	**378**	100%

Source: ROP Statistics 2021

As it can be seen from the above table about 48% of the exports are to UAE and 27% of exports are to Qatar.

- **HS Code : 72173000**

Exported by HS code	Quantity in Tons	2015	2016	2017	2018	2019	2020	2021
72173000	Value in RO	5,435	41,180	190	-	1,570	1,066	17,980
	Quantity in Tons	174	216	1	-	4	11	24
	Value in RO/Ton	**31**	**191**	**190**	**-**	**438**	**101**	**746**

Source: ROP Statistics 2021

Export Destinations	Value (RO)	Quantity (Kg)	RO/Ton
Saudi Arabia	17,980	24,105	745.90

Source: ROP Statistics 2021

- **HS Code : 72179000**

Exported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72179000	Value in RO	163,255	195,051	131,839	9,044	1,405	206,109	177,847
	Quantity in Tons	638	744	473	43	13	676	480
	Value in RO/Ton	**256**	**262**	**279**	**211**	**109**	**305**	**371**

Source: ROP Statistics 2021

Export Destinations	Value (RO)	Quantity (Kg)	RO/Ton	% of Total
Yemen	128,844	376,660	342	79%
Kuwait	47,908	101,998	470	21%
Romania	764	1,000	764	0%
Indonesia	330	90	3667	0%
Total	**177,846**	**479,748**	**371**	100%

Source: ROP Statistics 2021

The major exports are to UAE comprising of about 79% of the total exports followed by Kuwait comprising of 21% of the total exports from Oman.

3.3.2.4.Summary of Exports from Oman

The table below details the total Exports from Oman for the last 7 years.

Exported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72171000	Value in RO	983,409	763,055	50,374	16,329	186,838	34,430	6,604
	Quantity in Tons	1,151	4,174	285	36	890	164	10
	Value in RO/Ton	854	183	177	454	210	211	632
72172000	Value in RO	6,021,658	5,312,630	4,071,124	203,747	2,336,727	4,400,872	9,898,918
	Quantity in Tons	22,409	19,805	13,444	705	9,661	16,151	26,219
	Value in RO/Ton	269	268	303	289	242	272	378
72173000	Value in RO	5,435	41,180	190	-	1,570	1,066	17,980
	Quantity in Tons	174	216	1	-	4	11	24
	Value in RO/Ton	31	191	190	#DIV/0!	438	101	746
72179000	Value in RO	163,255	195,051	131,839	9,044	1,405	206,109	177,847
	Quantity in Tons	638	744	473	43	13	676	480
	Value in RO/Ton	256	262	279	211	109	305	371
Total Exports	**Value in RO**	**7,173,757**	**6,311,916**	**4,253,527**	**229,120**	**2,526,540**	**4,642,477**	**10,101,349**
	Quantity in Tons	**24,372**	**24,939**	**14,203**	**784**	**10,568**	**17,000**	**26,733**
	Value in RO/Ton	**294**	**253**	**299**	**292**	**239**	**273**	**378**

Source: ROP Statistics 2021

The total export from Oman was around 26,733 tons in the year 2021.

3.3.2.5.Re Exports of Oman

- **HS Code: 72171000**

Re Exported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72171000	Value in RO	1,869	6,474	4,874	41,185	34,654	39,451	574
	Quantity in Tons	12	25	14	79	60	82	0
	Value in RO/Ton	162	262	354	521	577	478	1,320

Source: ROP Statistics 2021

Re Export Destinations	Value (RO)	Quantity (Kg)	RO/Ton	% of Total
Djibouti	3,958	10,035	394	31%
Oman Freezone	574	435	1320	1%
Somalia	5,267	19,918	264	62%
Thailand	475	1,564	304	5%
Total	**10,274**	**31,952**	**322**	100%

Source: ROP Statistics 2021

- **HS Code: 72172000**

Re Exported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72172000	Value in RO	42,669	52,892	157,423	98,857	113,106	97,156	17,117
	Quantity in Tons	94	200	546	130	377	218	41
	Value in RO/Ton	452	264	288	762	300	445	420

Source: ROP Statistics 2021

Re Export Destinations	Value (RO)	Quantity (Kg)	RO/Ton	% of Total
Oman Freezones	17,117	40,731	420	60%
Somalia	1,925	27,300	71	40%
United Arab Emirates	348	335	1,039	0%
Total	**19,390**	**68,366**	**1,530**	100%

Source: ROP Statistics 2021

- **HS Code: 72173000**

Re Exported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72173000	Value in RO		9	4	626	1,897	2,472	634
	Quantity in Tons		1	0	1	3	3	0
	Value in RO/Ton		10	800	676	730	758	2,006

Source: ROP Statistics 2021

Re Export Destinations	Value (RO)	Quantity (Kg)	RO/Ton	% of Total
United Arab Emirates	12,925	18,700	691	98%
Oman Free Zones	634	316	2,006	2%
Total	**13,559**	**19,016**	**713**	100%

Source: ROP Statistics 2021

- **HS Code: 72179000**

Re Exported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72179000	Value in RO	1,200	38,688	28,291	30,517	39,584	7,997	2,271
	Quantity in Tons	4	99	274	89	135	10	4
	Value in RO/Ton	306	390	103	344	293	770	648

Source: ROP Statistics 2021

Re Export Destinations	Value (RO)	Quantity (Kg)	RO/Ton	% of Total
Yemen	24,448	119,000	205	69%
United Arab Emirates	15,043	43,367	347	25%
Somalia	2,056	6,640	310	4%
Oman Free Zone	2,271	3,504	648	2%
Qatar	1,196	8	149,500	0%
Total	**45,014**	**172,519**	**261**	100%

Source: ROP Statistics 2021

3.3.2.6.Summary of Re exports from Oman

Re Exported by HS code	Units	2015	2016	2017	2018	2019	2020	2021
72171000	Value in RO	1,869	6,474	4,874	41,185	34,654	39,451	574
	Quantity in Tons	12	25	14	79	60	82	0
	Value in RO/Ton	162	262	354	521	577	478	1,320
72172000	Value in RO	42,669	52,892	157,423	98,857	113,106	97,156	17,117
	Quantity in Tons	94	200	546	130	377	218	41
	Value in RO/Ton	452	264	288	762	300	445	420
72173000	Value in RO	-	9	4	626	1,897	2,472	634
	Quantity in Tons	-	1	0	1	3	3	0
	Value in RO/Ton	-	10	800	676	730	758	2,006
72179000	Value in RO	1,200	38,688	28,291	30,517	39,584	7,997	2,271
	Quantity in Tons	4	99	274	89	135	10	4
	Value in RO/Ton	306	390	103	344	293	770	648
Total Re Exports	**Value in RO**	**45,738**	**98,063**	**190,592**	**171,185**	**189,241**	**147,076**	**20,596**
	Quantity in Tons	**110**	**325**	**833**	**298**	**575**	**314**	**45**
	Value in RO/Ton	**417**	**302**	**229**	**574**	**329**	**468**	**458**

Source: ROP Statistics 2021

Based on the above HS Codes, the total quantity Re Exported under HS is around 45 Tons during 2021.

3.3.2.7.Estimated Demand / Consumption

The following rationale has been used to estimate the demand for binding wires in Oman:

- The net exports has been arrived at based on the Imports / Exports and Re-exports data provided by ROP customs.
- The local production data is not available. However, discussions with the local manufacturers indicate that about 70% of the production gets exported. The domestic production has been exported based on the ratio.
- The domestic demand for wires has been estimated based on the above data i.e., Domestic Production + Imports – Exports – Re-exports.
- It may be noted that the above is the demand for wires of different specifications. Discussions with the industry experts peg the demand for binding wires used in the construction sector to be about 10% of the above demand.

The following table illustrates the overall demand for binding wires estimated based on the above rationale.

Details	2015	2016	2017	2018	2019	2020	2021
Domestic production	34,817	35,627	20,290	1,120	15,097	24,286	38,191
Imports (in Tons)	66,077	70,148	65,659	72,962	49,889	45,840	61,722
Exports (in Tons)	24,372	24,939	14,203	784	10,568	17,000	26,733
Re-exports	110	325	833	298	575	314	45
Estimated Consumption (Local Production* + Imports - Exports - Re-exports	76,412	80,511	70,912	73,000	53,843	52,811	73,134
Estimated Consumption of Binding wires (10% of the above)	**7,641**	**8,051**	**7,091**	**7,300**	**5,384**	**5,281**	**7,313**

Based on the above the estimated consumption of steel wires is around 7,313 tons for the year 2021.

3.4. DEMAND PROJECTION

Based on this the Local demand for drawn wires are projected as below:

Year	2021	2022	2023	2024	2025	2026	2027
Demand (Tons)	7,313						
Projected Growth rate	%	3 %	3 %	3 %	3 %	3 %	3 %
Projected Demand (Tons)		7,533	7,759	7,992	8,231	8,478	8,733

3.5. POTENTIAL FOR EXPORTS TO GCC COUNTRIES

The import of steel wires, illustrated below, has been considered as an indication of potential for exports to GCC countries (other than Oman).

Imports by HS Codes	Units	2017	2018	2019	2020
721710	Value in USD thousand	38,700	37,320	56,090	36,425
	Quantity in Tons	60,609	53,417	92,070	55,745
	USD/Ton	639	699	609	653
	Major Importers	**UAE, Bahrain, Qatar and Saudi Arabia**			
721720	Value in USD thousand	91,993	105,047	84,998	60,684
	Quantity in Tons	123,117	117,389	110,879	85,756
	USD/Ton	747	895	767	708
	Major Importers	**UAE, Oman, Qatar & Kuwait**			
721730	Value in USD thousand	14,677	14,593	18,539	25,048
	Quantity in Tons	12,698	11,675	15,239	21,007
	USD/Ton	1156	1250	1217	1192
	Major Importers	**UAE & Saudi Arabia & Oman**			
721790	Value in USD thousand	28,084	35,155	30,089	42,318
	Quantity in Tons	43,550	43,583	41,483	64,609
	USD/Ton	645	807	725	655
	Major Importers	**Saudi Arabia, UAE & Qatar**			
Total Imports	**Value in USD thousand**	**173,454**	**192,115**	**189,716**	**164,475**
	Quantity in Tons	**239,974**	**226,064**	**259,671**	**227,117**
	USD/Ton	**723**	**850**	**731**	**724**

Source: UN Comtrade Data

Total import of steel wires into GCC countries except Oman was around 227,000 tons in 2020. Considering 10% of this to be binding wires the potential for export of binding wire is estimated at about 22,700 tons as of 2020.

3.6. COMPETITION ANALYSIS

As detailed in the earlier sections, there are wire drawing units in Oman catering to their respective captive requirements as well as to the open market. However, the main competition for the proposed project shall be from the Imports mainly from UAE and China.

3.6.1. Local manufacturer

Universal Wires LLC based in Sohar, Sultanate of Oman manufactures Hot Dip Galvanised Wires. It has the capacity to produce 60,000 Metric tons of Hot Dipped Galvanised Steel Wires, annually. The plant is capable of producing Galvanized wires of sizes varying from 0.9 to 4.0 mm diameter.

Their key products include

- Cold Drawn/ Bright Wire
- Black Annealed wire
- Hot Dip Galvanized wire

3.7. MARKETING MIX STRATEGY OF COMPETITORS

3.7.1. Product

The steel wires are drawn to different sizes as per the end-use requirements. Typically, 6 mm – 8mm wire rods are drawn to an area reduction of 15% – 25%. Steel wires available in the market have diameter ranging from 3 mm to 0.8 mm.

S. No	Name of the Company	Product Size (MM)	Coil Weight (Kgs)
1	Universal Wires LLC	0.9 , 1.25 , 1.4 , 1.6 , 2.0 , 2.5 , 3.15 , 3.5 , 4.0 (MM)	250 -1000

3.7.2. Pricing

Based on the brief primary survey and on secondary research, the binding wires are sold in the range of RO 600 – 650 per ton.

3.7.3. Promotion

Competitive pricing is the key to promoting the product.

3.7.4. Trade Credit

The industry practice is to offer a reasonable credit period depending on the credit worthiness of the client (adopted by the traders importing mainly from UAE and China). Often discounts of 5 – 10 percent are also given to the clients.

3.7.5. Distribution

The distribution process is through direct sales to contractors in the construction industry and to traders seeking the product.

3.8. PROPOSED MARKETING MIX STRATEGY FOR THE COMPANY

3.8.1. Product Mix

The project will manufacture steel wires in the range from 3 mm to 0.8 mm. Binding wires will be the final finished product having inlet wire diameter ranging from 0.8 mm to 1.2 mm.

The following will be the product range that the project will manufacture

- Steel wires – Sizes 1.2 mm to 3 mm
- Binding Wires – Sizes 0.8 mm to 1.2 mm

3.8.2. Target Market

The project being located in Oman, it can market the products in all the regions. The target market groups should be mainly:

- Building Contractors and
- Wholesalers

3.8.3. Pricing

Based on the competition expected from the local players and from imports, the average selling price of the binding wires is considered at RO 600 per ton (USD 1,550 per ton).

3.8.4. Promotion

The company shall concentrate on building healthy personal contacts with various segments mainly in construction industry.

The plant manager shall be responsible for sales as well. The manager shall build and retain long term relationships with customer segments

3.8.5. Trade Credit

The company could also offer its customers a credit period of 90 days as per the industry norms.

3.8.6. Distribution

The company would concentrate on direct marketing to the contractors and traders in Oman. It will appoint wholesale distributors in other GCC markets.

3.9. PROJECTED MARKET SHARE

The unit with a production capacity of 816 MT per annum can effectively leverage its capability to service the target market.

DETAILS	2023	2024	2025	2026	2027
Total Local demand (Tons)	7,759	7,992	8,231	8,478	8,733
Projected Sales (Tons)		653	734	734	734
Market Share (%)		8%	9%	9%	8%

Considering the target market potential and the conservative demand projections made, the proposed market shares are achievable.

It may also be noted that the project is capable of manufacturing wires of diameters up to 4 mm which also can be sold in the market for various applications. However, the financial projections have not taken the same into consideration.

4. TECHNICAL ANALYSIS

4.1. LOCATION

The proposed project can be located either at Sohar Industrial City or at the proposed Shinas Industrial City. The referred locations are taking proximity to raw material and the target market into consideration.

4.2. MANUFACTURING PROCESS

4.2.1 Wire drawing process

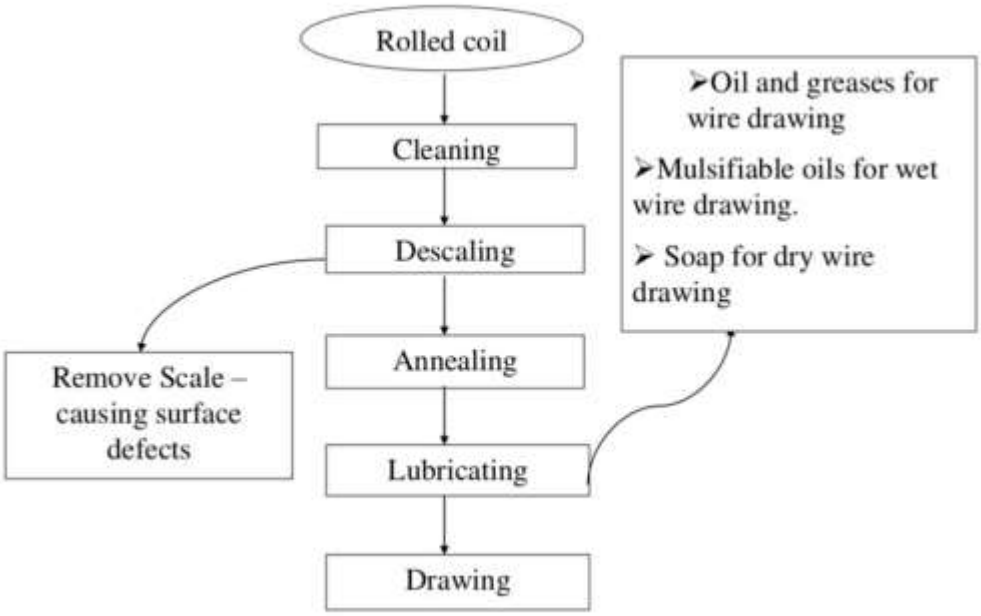
Wire drawing is done on continuous drawing machines that consist of multiple draw dies, separated by accumulating drums between the dies. The wire drawing dies is conical shape. The end of the rod or wire, which is to be further reduced is made into a point shape and inserted through the die opening.

Before the wire is drawn, the stock needs to be prepared for wire drawing. The material should be sufficiently ductile since it is pulled by tensile forces. Hence the wire may have to be annealed properly to provide the necessary ductility. Further, the wire is to go through the conical portion and then pulled out through the exit by the gripper. In this process, there is no force applied for pushing wire into the die from the entrance side.

The other aspects of preparation needed are the cleaning of the wire and lubricating it as it flows through the die. Cleaning is essentially done to remove any scale and rust present on the surface which may severely affect the die.

The drawing machines can be arranged in tandem so that, the wire coming from one die is coiled up to a sufficient length before it is re-entered into the subsequent die and so on there is no change in volume successive drawing have to be done at higher speeds.

Process Flow Chart



The automatic production line of straight line wire drawing machines manufactures wire.

The automatic wire drawing production line consists of 6 Parts

- Heavy duty wire spool: The raw materials are placed in the pay-off rack, which can carry out 2 tons of iron wire.
- Peeling Machine: Removes calamine from wire rod so that the drawing process is fluid and effective.
- Head Pointing Machine: Grind the round wire end into a pointed shape, it is easier to facilitate the wire into the wire drawing machine die.
- Wire Drawing Machine: It is the most important and main machine in the whole system. Depending on the size of the wire diameter range to be reduced, the length of the wire drawing machine line varies. If the customer needs to reduce the range of wire diameters, the number of wire drawing dies required will be larger, and the production line will be longer.
- Trunk Take up machine: Automatic rewinding of the desired final diameter wire

- Butt welding Machine: Allows the union of two coils (or rolls) of wire drawn by means of a spot welder to fuse their lengths and offer coils in any weight

4.3. LAND & BUILDING

The company will rent an industrial shed with a building area of 1,300 Sq. m Details are in Annexure 1.1 and 1.2.

4.4. MACHINERY

The major machinery required for the project is Wire Drawing Machine. Major suppliers are available in India and China.

The details of the main and auxiliary machineries required for the project is as detailed in Annexure 1.3.

4.5. MACHINERY SUPPLIERS

The following table illustrates the list of machinery manufacturers of wire drawing machines

No.	Detail
1	HEBEI RONGKUAI Machinery Manufacturing Co Ltd Luzhauang Industrial Zone, Anping County, Hebei Province, China www.jiakemeshmachine.com
2	Shijiazhuang Satle Machinery Manufacture Co Ltd Gaoqian Industry, Luquan District, Shijiazhuang City Hebei Province, China Tel:+86-311-82265689 www.cnwiremachine.com
3	Anping County Yingzan Wire MeshCo., Ltd. Anping,Hebei,China Tel: 0086-18333802881 Website: yingzanmetalmesh. com

4.6. PLANT CAPACITY

The annual production capacity is estimated at 816 tons per annum for 8 hours operation. The details of capacity and the capacity utilization for various years are given in the table below:

Details	Year 1	Year 2	Year 3	Year 4	Year 5
Installed capacity (Tons)	816	816	816	816	816
Capacity utilization	80%	90%	90%	90%	90%
Actual Production considered for financial Projection (Tons)	653	734	734	734	734

4.7. VEHICLES

The vehicles are required for movement of raw materials and internal material movement. Details of Vehicles are provided in Annexure 1.4.

4.8. RAW MATERIALS AND CONSUMABLES

Raw materials include MS Rods 6 / 8 mm diameter apart from other required consumables.

4.9. UTILITIES

4.9.1. Water

Water is required for mainly human consumption. It is estimated that 1,000 M^3 of water is required per annum.

4.9.2. Electricity

Electricity is used for machine operations and for general purpose lighting. The connected load is around 553 kW and the annual consumption of electricity will be about 1,328,040 KWH at full capacity.

4.10. MANPOWER

The total manpower required for the operation is 14.

4.11. PROJECT IMPLEMENTATION

Being an SME project, the total expected time duration for implementation shall be around 12 months.

5. FINANCIAL ANALYSIS

5.1. PROJECT COST

The total cost of the project is estimated at RO 174,000. Details are given in Annexure – 1. The break-up is given below:

Details	Amount (RO)
Plant & Machinery	62,000
Vehicles and Internal Transport	11,000
Furniture & Office Equipment	5,000
Pre- Operative Expenses	11,000
Contingency & Escalation	4,000
Sub Total	***93,000***
Working Capital	81,000
TOTAL CAPITAL	**174,000**

5.1.1. Land & Building

Industrial Shed of area 1,300 SqM will be rented for this project. Details are provided in Annexure 1.1 and 1.2.

5.1.2. Plant & Machinery

The total cost of plant and machinery is estimated at RO 62,000. Details are given in Annexure- 1.3.

5.1.3. Vehicles & Internal Transport

The total cost of vehicles and internal transport is estimated at RO 11,000. Details are given in Annexure- 1.4.

5.1.4. Furniture & Office Equipment

The total cost of furniture and office equipment is estimated at RO 5,000. Details are given in Annexure- 1.5.

5.1.5. Pre-Operative Expenses

The pre-operative expenses include expenses for feasibility study, interest during project implementation, salaries and wages of project staff, travel and communication, legal fees, audit fees and other miscellaneous expenses. The total pre-operative expenses are estimated at R.O 11,000. Details are given in Annexure- 1.6.

5.1.6. Contingency & Escalation

A provision of 5 % of the estimated cost of items including building, plant & machinery, vehicles etc., is provided in the Project cost towards price escalation and any unforeseen expenses. This works out to RO 4,000. Details are given in Annexure- 1.7

5.1.7. Working Capital

Following assumptions are made for computation of working capital.

Details	Period
Accounts Receivable	2 Months
Raw Materials	1 Month
Consumables & packing	1 Month
Utilities	1 Month
Factory Wages	1 Month
Administration Expenses	1 Month
Sales Expenses	1 Month
Work in Progress	3 Days
Finished Goods	5 Days
Finance Cost	1 Month
PAYABLES	
Raw Materials	1 Month

The working capital requirements for the first 4 years of operation are given below. The working capital requirement in the first year comes to RO 81,000. Details are given in Annexure 1.8.

Particulars	Year 1	2	3	4
Working Capital Requirement (RO '000)	81	88	89	89

5.2. MEANS OF FINANCE

It is proposed to finance the Project as indicated in the following table.

Means of Finance	Amount (RO)
Equity Capital (40% of Project Cost)	69,600
Term Loan from ODB 3% interest rate	55,400
Commercial Loan for Working Capital	125,000
TOTAL	**174,000**

It is proposed that the total project cost of RO 174,000 will be financed by owner's fund [equity] to the tune of RO 69,600, term loan from ODB with an interest of 3% for RO 55,400 and commercial borrowings for working capital at RO 49,000. The working capital loan is expected to carry interest @ 6% per annum.

5.3. COST OF SALES

The cost of sale has been projected for the first ten years of operation (Annexure-2) and those of first five years are summarized as below:

Figures are in RO '000)

Details	Year 1	Year 2	Year 3	Year 4	Year 5
Raw Materials	196	221	221	221	221
Utilities	32	37	37	37	37
Factory Wages	59	60	61	62	63
PRIME COST	288	317	318	319	320
Rent for Shed	31	31	31	31	31
Factory Overheads	3	3	3	3	3
Misc. Factory Exp.	6	7	7	7	7
FACTORY COST	**329**	**359**	**360**	**361**	**362**
Admin. Salaries	17	17	18	18	19
Admin. Expenses	7	7	7	7	8

Details	Year 1	Year 2	Year 3	Year 4	Year 5
TOTAL ADMIN EXPENSES	24	24	25	26	27
Sales Salaries	8	9	9	9	9
Sales Expenses	1	1	2	2	2
Advert.& Business Promotion	8	9	9	9	9
Total sales & distribution costs	18	19	19	20	20
OPERATING COST	**370**	**402**	**404**	**406**	**408**
Finance cost					
Int. on Institutional finance	2	2	2	1	1
Int. on working capital	3	3	3	3	3
Total finance cost	5	5	5	4	4
Non-cash expenses					
Depreciation	10	10	10	10	10
Prelim Expenses written off	11	0	0	0	0
Total Cost	**396**	**417**	**419**	**421**	**423**

5.3.1. Raw Materials

The cost of raw materials & consumables works out to RO 245,462 at full capacity and the details are in Annexure 2.1.

5.3.2. Utilities

The total cost of utilities for working in full capacity is RO 40,611. The basis of estimate is given in Annexure 2.2.

5.3.3. Salaries & Wages

The cost of salaries and wages in the first year of operation is RO 84,168. Details are given in Annexure 2.3.

5.3.4. Factory Overheads

The annual expenses include repairs and maintenance, civil repairs, cost of spares, spare parts, insurance and vehicle expense and the same is estimated at RO 3,100 for the first year, RO 3,224 for the second and RO 3,354 for the third year. Details are given in Annexure- 2.4.

5.3.5. Administrative Expenses

The basis of estimates of administrative expenses inclusive of salaries & wages is given in Annexure 2.5 and it works out to RO 23,700. Administrative expense includes salaries and benefits, vehicle expenses, communication related expenses, stationery, etc.

5.3.6. Depreciation

Depreciation works out to RO 10,350. Depreciation calculation is given in annexure- 2.7. The following are the rates considered for the calculation of depreciation.

Assets	Life (years)	% of depreciation
Plant & Machinery	10	10
Vehicles and Internal Transport	4	25
Furniture & Office Equipment	5	20

5.3.7. Loan & Interest Calculation

Interest rate for term loan from ODB and loan for working capital is taken at 3% and 6% respectively. Details of interest calculations are given in Annexure- 2.8.

5.4. INCOME TAX

No income tax is provided as the new units are exempted from tax for the first five years and 15% tax is considered from 6th year onwards.

5.5. SALES REALIZATION

The annual sales realization at installed capacity is given as annexure 3.1. The annual sales realization is provided below:

Detail	Year 1	Year 2	Year 3	Year 4	Year 5
Sales – RO '000	**392**	**441**	**441**	**441**	**441**

5.6. COST RATIOS

The major cost indicators as a percentage of sales realization are given in Annexure- 3.

Details	Year 1	Year 2	Year 3	Year 4	Year 5
Raw Material / Total Sales	50.1%	50.1%	50.1%	50.1%	50.1%
Utilities / Total Sales	8.3%	8.3%	8.3%	8.3%	8.3%
Factory wages / Total Sales	15.1%	13.6%	13.8%	14.0%	14.2%
Prime Cost / Total Sales	73.5%	72.0%	72.2%	72.4%	72.6%
Factory exp. / Total Sales	10.4%	9.4%	9.4%	9.4%	9.5%
Factory Cost / Total Sales	83.9%	81.4%	81.7%	81.9%	82.1%
Admin. exp. / Total Sales	6.1%	5.5%	5.7%	5.9%	6.0%
Selling exp. / Total Sales	4.5%	4.3%	4.4%	4.4%	4.5%
Finance Cost / Total Sales	1.2%	1.0%	1.0%	1.0%	0.9%
Non-Cash exp. /Total Sales	5.5%	2.3%	2.3%	2.3%	2.3%
Total Cost / Sales	**101.1%**	**94.6%**	**95.1%**	**95.5%**	**95.9%**

Being an engineering unit with skilled operators employed, the factory wages other than Raw Material costs would be a major cost element.

5.7. NET PROFIT AND PROFITABILITY ANALYSIS

As per the financial projection in Annexure – 3, the venture is financially viable. The summary of the analysis is given under:

(Figures are in RO '000)

Details	Year 1	Year 2	Year 3	Year 4	Year 5
Revenue	392	441	441	441	441
PBDIT	**22**	**39**	**36**	**34**	**32**
Depreciation	10	10	10	10	10
Finance Cost	5	5	5	4	4
Prelim. Exp. Written Off	11				
Profit after tax	**-4**	**24**	**22**	**20**	**18**

5.8. KEY APPRAISAL CRITERIA

The viability of the project based on major appraisal criteria is given below.

Detail	Value
IRR on total investment	15.51%
IRR on Equity	30.55%
Payback period of Total Investment	6 years 2 months
Payback period on equity	3 Years 1 month
DSCR	2.83

5.9. SENSITIVITY ANALYSIS

A sensitivity analysis has been carried out to determine the susceptibility of the project to changes in main variables. Effect on the IRR on equity investment, based on 10 years of operation due to change in various variables is as follows:

Particulars	Original	Sales Volume down by 5%	RM Cost up by 5%	Sales Value down by 5%
IRR on Investment	15.5%	10.2	9.1	2.7
IRR on equity	30.5%	19.2	17.0	5.3

6. FACTORS TO CONSIDER BEFORE PROJECT IMPLEMENTATION

The following key factors have to be considered before implementing the project:

- The cost estimates of Plant and Machinery is based on budgetary offer received. The actual cost during implementation stage could change based on various factors like currency exchange rates, raw material price increase etc. It is advisable that the investor for the project should receive revised quotations from potential machinery suppliers before implementing the project.

- Capacity utilization is one of the major factors that shall determine the actual viability of the project.

- Quality is another major parameter to consider based on which customer build up shall happen over the period of years. Failure in delivering quality service to clients shall lead to the failure of the unit. It is recommended that required qualified technical resources are deployed for the successful operation of the project.

- The cost of raw material is a major factor that influences the profitability of the project. Prudent management of raw material stocks is key to ensuring profitable operations.

7. CONCLUSION

The IRR on Total Investment for the project is 15.5% and the IRR on Equity Investment is 30.5%.

The project has a healthy DSCR of 2.83.

Based on the various analysis carried out and as detailed above, the project is found to be technically feasible and financially viable.

Annexures – Financial Projections

ANNEXURE- 1				
BINDING WIRE MANUFACTURING PROJECT				
ESTIMATED PROJECT COST				
S.No.	**Item**	**Amount**		**Remarks**
		(RO)		
A1	**PROJECT COST**			
1	Land & Building etc.	0		Lease Rental
2	Plant & Machinery	62,000		Estimates
3	Vehicles and Int. Transport	11,000		Estimates
4	Furniture & Office Equip.	5,000		Estimates
5	Pre- Operative Expenses	11,000		Estimates
6	Contingency & Escalation	4,000		Estimates
	Sub Total		**93,000**	
A2	**WORKING CAPITAL**		**81,000**	
A3	**TOTAL**		174,000	
	Say		**174,000**	
B	**MODE OF FINANCE**			
1	Equity		69,600	40%
2	Term loan from ODB		55,400	
3	Sub-Total		**125,000**	
4	Working Capital Loan		49,000	60%
	TOTAL		**174,000**	

ANNEXURE- 1.1						
BINDING WIRE MANUFACTURING PROJECT						
ESTIMATED COST OF LAND & SITE DEVELOPMENT						
S. No.	**Item**	**Unit**	**Q'ty**	**Rate**	**Amount**	**Remarks**
				(R.O.)	**(R.O.)**	
A	**LAND**					
1	Land for Plant	Sq. M		0	-	Rented
B	**SITE DEVELOPMENT**					
1	Soil Testing				-	
2	Levelling				-	
3	Sewerage/Drainage				-	
4	Prov for Electric line				-	
	Sub Total				**-**	
C	**TOTAL**				-	

ANNEXURE- 1.2					
BINDING WIRE MANUFACTURING PROJECT					
ESTIMATED COST OF BUILDING & CIVIL WORKS					
S.No.	**Item**	**Area**	**Rate**	**Amount**	**Remarks**
		(SqM)	**(R.O.)**	**(R.O.)**	
A	**MAIN PLANT BUILDINGS**				
1	Plant Area	500	-	-	
2	Store for RM	300	-	-	
3	Store for Finished Goods	200			
	Sub Total	**1,000**		**-**	
B	**ADMIN BUILDING**				
1	Office Building	300	-	-	
2					Industrial Shed will be rented
3					
	Sub Total			**-**	
C	**OTHER CIVIL WORKS**				
1	Compound wall & gate		-		
2	Associated Electro-mechanical works		-	-	
	Sub Total	**1,300**		**-**	

ANNEXURE- 1.3						
BINDING WIRE MANUFACTURING PROJECT						
ESTIMATED COST OF PLANT & MACHINERY						
S.No.	**Item**	**Power**	**Q'ty**	**Rate**	**Amount**	**Remarks**
		KW		**(USD)**	**(R.O)**	
A	**MAIN PLANT AND MACHINERY**				0.385	
	Straight Line Wire Drawing Machine (LZ-560-2, 6 -2.2 mm, 8 drawing pots)	22KW *8 pcs	1			1290 Kg/hour
1	**Auxillary Equipments**					
1.1	Upper pull out wire rack		1			
1.2	Wire Pointing Machine		1	69,800	**26,873**	
1.3	Mechanical Sheller		1			
1.4	Butt Welding Machine		1			
1.5	Electric Control cabinet		1			
1.6	Operation cabinet		1			
2	Drawing Dies - Poly crystalline diamond cutting tools					
	5.4 mm		1	85	33	
	4.7 mm		1	75	29	
	4.1 mm		1	65	25	
	3.6 mm		1	57	22	
	3.2 mm		1	51	20	
	2.8 mm		1	45	17	
	2.45 mm		1	39	15	
	2.2 mm		1	35	13	
3	Trunk Type Wire Coiling Machine		1	7,800	3,003	
	Sub Total				**30,050**	
	Wet Wire drawing machine DLW - 350					
5	**Wet Wire drawing machine DLW - 350**		1	8,900		
5.1	Butt Welder		1	200		
5.2	Head Pointing Machine		1	1800		
5.3	Drawing Die (0.8 , 0.88, 0.97, 1.06, 1.17, 1.28, 1.41, 1.55, 1.70, 1.85, 2.05)		11	20		
5.4	Extra Recoiler		1	100		
	Sub Total		**2**	**11,020**	**8,485**	(2 sets of wet wire drawing machine)
6	**Electric Furnace**		1	17,800	6,853	
6.1	Inner Pot		2	5,000	3,850	
	Sub Total				**10,703**	
	Total Plant Cost				**49,238**	
B	**ELECTRIFICATION**				**5,000**	
C	**AT SITE COST**					
1	Total Plant				54,238	Sum A+B
2	Spares				2,500	Lumpsum
3	Packing, Insurance Forwarding				1,627	3% of C1
4	C I F Cost				58,366	
5	Clearing & Transport to Site				1,231	2.5% of the plant co
6	**At Site Cost**				**59,597**	
D	**ERECTED COST**					

ANNEXURE- 1.3						
BINDING WIRE MANUFACTURING PROJECT						
ESTIMATED COST OF PLANT & MACHINERY						
S.No.	**Item**	**Power**	**Q'ty**	**Rate**	**Amount**	**Remarks**
		KW		**(USD)**	**(R.O)**	
1	At Site Cost				59,597	
2	Cost of erection - Local				2,500	Lumpsum
	TOTAL ERECTED COST				**62,097**	
	Say				**62,000**	

ANNEXURE- 1.4					
BINDING WIRE MANUFACTURING PROJECT					
ESTIMATED COST OF VEHICLES & INTERNAL TRANSPORT					
S.No.	**Item**	**Q'ty**	**Rate**	**Amount**	**Remarks**
		(Nos.)		**(R.O.)**	
A	**VEHICLES**				
1	Cars	-	-	-	
2	Pick up	1	10,000	10,000	
	Sub Total	**1**		**10,000**	
B	**TRANSP. EQUIPMENT**				
1	Registration, Painting, Spares etc			1,000	10% of the above
	Sub Total	**-**		**1,000**	
C	**TOTAL**	1		11,000	
	Say			**11,000**	

ANNEXURE- 1.5					
BINDING WIRE MANUFACTURING PROJECT					
ESTIMATED COST OF FURNITURE & OFFICE EQUIPMENT					
S.No.	**Item**	**Q'ty**	**Rate per Unit**	**Amount (R.O.)**	**Remarks**
A	**OFFICE**				
1	P.C with Printer	4	300	1,200	Lumpsum
2	Photocopier			250	Lumpsum
3	Fax, Telephone	Set		250	Lumpsum
4	Other Office Equipment	Set		500	Lumpsum
5	Air Conditioners	2	250	500	Lumpsum
6	Office Furnitures			1,000	Lumpsum
	Sub Total			**3,700**	
B	**FACTORY FURNITURE**				
1	Work bench/Rack/Firniture etc			**500**	
	Sub Total			**500**	
B	**ACCOMODATION FURNITURE**				
1	Furniture / Fittings	Set		900	Lumpsum
	Sub Total			**900**	
C	**TOTAL**			5,100	
				5,000	

ANNEXURE- 1.6				
BINDING WIRE MANUFACTURING PROJECT				
ESTIMATED COST OF PRE-OPERATIVE EXPENSES				
S.No	**Item**		**Amount**	**Remarks**
		(R.O.)	**(R.O.)**	
1	Preliminary Expenses		500	Upto formation of Co.
2	Feasibility Studies		1,000	
3	Salary during construction period			
a	Salary & benefits - Plant Manager	1,000		1 Months
b	Salary & benefits - Production Staff	1,005		1 Month
c	Salary & benefits - Admin. Staff	1,000		1 Month
d	Salary & benefits - Sales Staff	500		1 Month
e	Visa, Passage etc.	2,000		For Expatriates at RO 400 per Person
	Sub Total		**5,505**	
4	Financing Cost			
a	Institutional Loan Interest	831		At 3%
b	Mortgage Expenses	277		At 0.5 % on Institu: Loan
c	Other Bank Charges	100		Lumpsum
	Sub Total		**1,208**	
5	Communication		600	lumpsum
6	Travel		500	Lumpsum
7	Recruitment & Training Charges		500	Lumpsum
8	Audit Fees, Legal Fees		500	Lumpsum
9	Insurance		248	At 0.4 % of Plant & Bldg.
10	Miscellaneous		500	Provision
11	Total		11,061	
	Say..		**11,000**	

ANNEXURE- 1.7					
BINDING WIRE MANUFACTURING PROJECT					
ESTIMATES OF CONTINGENCY AND ESCALATION					
S.No.	**Item**	**Cost**	**Rate**	**Provision**	**Remarks**
		(R.O.)	**(%)**	**(R.O.)**	
A	**FIXED ASSETS**				
1	Land for Plant Site	-	0.0	-	
2	Building etc.	-	5.0	-	
3	Plant & Machinery	62,000	5.0	3,100	
4	Technical Know-How	-	5.0	-	
5	Vehicles and Int. Transport	11,000	5.0	550	
6	Furniture & Office Equip.	5,000	5.0	250	
7	Pre- Operative Expenses	11,000	5.0	550	
	TOTAL			4,450	
				4,000	say

ANNEXURE- 1.8

BINDING WIRE MANUFACTURING PROJECT

ESTIMATES OF WORKING CAPITAL REQUIREMENTS

S.No.	Item	Req.		Year 1	Year 2	Year 3	Year 4	Remarks
					In R.O. '000			
1	Acct. Receivable	2	Months	62	68	68	68	Cost of sales - Non C Ex.
2	Raw Materials	1	Month	16.4	18.4	18.4	18.4	
3	Utilities	1	Month	2.7	3.0	3.0	3.0	
4	Factory Wages	1	Month	5	5	5	5	
5	Admn. Expenses	1	Month	2	2	2	2	
6	Sales Expenses	1	Month	1.5	1.6	1.6	1.6	
7	Work in Progress	3	Day	2.7	2.9	3.0	3.0	At Factory Cost
8	Finished Goods	5	Days	4.9	5.3	5.3	5.4	At total Cost-Non cash-Selling and Distrbn
9	Finance Cost	1	Month	0.4	0.4	0.4	0.4	At Finance Cost
10	**Sub Total**			**98**	**106**	**107**	**107**	
	Payables		Months					
	Raw Materials	1	Months	16	18	18	18	
	Sub Total			16	18	18	18	
	TOTAL			**81**	**88**	**89**	**89**	

ANNEXURE- 2

BINDING WIRE MANUFACTURING PROJECT

COST OF SALE

	Year of Operation	1	2	3	4	5	6	7	8	9	10	
	Production	80%	90%	90%	90%	90%	90%	90%	90%	90%	90%	
No	**Item**	**In R.O.'000**										**Remarks**
1	Raw Material & Consumables	196	221	221	221	221	221	221	221	221	221	Ref. Annexure 2.1
2	Utilities	32	37	37	37	37	37	37	37	37	37	Ref. Annexure 2.2
3	Factory Wages	59	60	61	62	63	64	64	65	66	67	Ref Annexure 2.3
4	**PRIME COST**	288	317	318	319	320	321	322	323	324	325	Sub total of 1 to 4
5	Rent for Industrial shed	31	31	31	31	31	33	33	33	33	33	RO 2.5/sqm/month
6	Factory Overheads	3	3	3	3	3	3	3	3	3	3	Ref Annexure 2.4
7	Misc. Factory Exp.	6	7	7	7	7	7	7	7	7	7	At 2 % of (5)&(6)
8	**FACTORY COST**	**329**	**359**	**360**	**361**	**362**	**364**	**365**	**366**	**367**	**368**	Sub total of 5 to 7
9	Admin. Salaries	17	17	18	18	19	19	20	21	21	22	Ref Annexure2.3&2.5
10	Admin. Expenses	7	7	7	7	8	8	8	8	8	9	Ref Annexure 2.5
11	Total Admin expenses	24	24	25	26	27	27	28	29	30	31	Sum (9) to (11)
12	Sales Salaries	8	9	9	9	9	10	10	10	11	11	Ref Annexure2.3&2.6
13	Sales Expenses	1	1	2	2	2	2	2	2	2	2	Ref Annexure 2.6
14	Advert.& Business Promotion	8	9	9	9	9	9	9	9	9	9	2% on sales
15	Total sales & dist: costs	18	19	19	20	20	20	21	21	22	22	Sum of (13 to 16)
16	**OPERATING COST**	**370**	**402**	**404**	**406**	**408**	**412**	**414**	**416**	**418**	**421**	Sum(8)+(12)+(17)
	Finance cost											
17	Int on Institutional finanace	2	2	2	1	1	1	1	0	0	0	Ref Annexure 2.8
18	Int on working capital	3	3	3	3	3	3	3	3	3	3	Ref Annexure 2.8
19	Total finance cost	5	5	5	4	4	4	4	3	3	3	Sum(19)+(20)
	Non cash expenses											
20	Depreciation	10	10	10	10	10	10	10	10	10	10	Ref Annexure 2.7
21	Prelim Expenses written off	11	0	0	0	0	0	0	0	0	0	Ref Annexure 2.7
22	**COST OF SALE**	**396**	**417**	**419**	**421**	**423**	**426**	**428**	**430**	**432**	**434**	Sum18+21+22+23

ANNEXURE- 2.1						
BINDING WIRE MANUFACTURING PROJECT						
ESTIMATED COST OF RAW MATERIALS						
S.No.	**Item**	**Unit**	**Qty**	**Rate**	**Amount**	**Remarks**
A	**RAW MATERIALS**				**(R.O.)**	
1	MS Rods 6/8mm diameter (includes 5% wastage)	Tons	857	270	231,568	USD 700 per ton
	SubTotal				**231,568**	
B	**CONSUMABLES (@ 5% of the selling price)**					
1	Drawing Powder				11,578	100 kg
2	Drawing dies					
3	Lubricants					
4	Other tools & fixtures					
	SubTotal				**11,578**	
	TOTAL				**243,146**	
C	**PACKING MATERIALS**					
	Packing materials				**2,316**	1% of revenue
	Grand Total				**245,462**	

ANNEXURE- 2.2						
BINDING WIRE MANUFACTURING PROJECT						
ESTIMATED COST OF UTILITIES (At installed capacity)						
S.No.	**Item**	**Unit**	**Qty**	**Rate**	**Amount**	**Remarks**
					(R.O.)	
1	Water	Cu M	1,000	0.770	770	3000 litres per day
2	Electricity	KWH	1,328,040	0.030	39,841	
	TOTAL				**40,611**	

ANNEXURE- 2.3							
BINDING WIRE MANUFACTURING PROJECT							
ESTIMATES OF ANNUAL SALARIES AND WAGES							
S.No.	**Item**	**No of personnel**		**Salary**		**Annual**	**Remarks**
				(RO/month)		**RO**	
		Expat	**Omani**	**Expat**	**Omani**		
A	**PRODUCTION & MAINTENANCE**						
1	Plant Manager	1	0	1,000		12,000	
2	Electrician	1		250		3,000	
3	Mechanical Technician	1		250		3,000	
4	Skilled Worker	4	0	250		12,000	
5	Unskilled workers	2	2	180	325	12,120	
	Sub Total	**9**	**2**			42,120	
	Total Manpower Cost						
	Total Salary					42,120	
	Other Benefits (40% of Salary)					16,848	
	Total Production Salary					**58,968**	
B	**ADMINISTRATION & ACCOUNTS**						
1	Accountant		1		500	6,000	
2	PRO/Admin Officer		1		500	6,000	
	Sub Total	0	2			**12,000**	
	Total Manpower Cost						
	Total Salary					12,000	
	Other Benefits (40% of Salary)					4,800	
	Total Cost	**0**	**2**			**16,800**	
C	**SALES**						
a	**Sales**						
1	Sales Executives	0	1	0	500	6,000	
2	Sub Total	0	1			6000	
b	**Total Manpower Cost**						
1	Total Salary					6,000	
2	Other Benefits (40% of Salary)					2,400	
3	**Total Cost**					**8,400**	
D	**GRAND TOTAL**	**9**	**5**			**84,168**	

ANNEXURE- 2.4					
BINDING WIRE MANUFACTURING PROJECT					
ESTIMATES OF ANNUAL FACTORY EXPENSES					
S.No.	**Item**	**Year**	**Year**	**Year**	**Remarks**
		1	**2**	**3**	
1	Repairs & Maintenance	1,240	1,302	1,367	At 2 % of erected cost of P & M increased by 5%
2	Spare Parts	1,240	1,302	1,367	At 2 % of erected cost of P & M increased by 5%
3	Insurance	620	620	620	At 1 % of cost Building, Plant and
					Machinery
	TOTAL	**3,100**	**3,224**	**3,354**	

ANNEXURE- 2.5				
BINDING WIRE MANUFACTURING PROJECT				
ESTIMATES OF ANNUAL ADMINISTRATIVE EXPENSES				
S.No.	**Item**		**Amount**	**Remarks**
		(R.O.)	**(R.O.)**	
1	Salaries & Benefits		16,800	
2	Rents and Rates			
3	Vehicle Expenses & Petrol			
a	Pick up	1800		At R.O. 150/Month each
	Sub Total		1,800	
4	Telephone, Fax etc.		1,200	At R.O. 100/Month
5	Stationery		1,200	At R.O. 100/Month
6	Legal, Audit Fees		500	Lumpsum
7	Utilities outside Plant		1,200	At R.O. 100/Month
8	Registratioin & Renewals		500	
9	Miscellaneous		500	
	Total		**23,700**	

ANNEXURE- 2.6			
BINDING WIRE MANUFACTURING PROJECT			
ESTIMATES OF ANNUAL SALES EXPENSES			
S.No.	**Item**	**Amount**	**Remarks**
		(R.O.)	
	SALES		
1	Salaries	8,400	See Annexure 2.3
2	Travel	500	Lumpsum
3	Vehicle Expenses & Petrol	-	
4	Miscellaneous Expenses	890	10 % of the above
	Total	**9,790**	

ANNEXURE- 2.7						
BINDING WIRE MANUFACTURING PROJECT						
DEPRECIATION CALCULATIONS						
	Item	**Cost**	**Rate**	**S.V.**	**Amount**	**Renewals**
			(%)	**(R.O.)**	**(R.O.)**	
A	**FIXED ASSETS**					
1	Land for Plant Site	0	0	0	-	Nil
2	Building etc.	0	5	0	-	Nil
3	Plant & Machinery	62000	10	0	6,200	Year 11
4	Vehicles and Int. Transp.	11000	25	5500	2,750	Years 5, 9
5	Furniture & Office Equip.	5000	20	0	1,000	Years 6, 11
6	Contingency & Escalation	4000	10	0	400	Nil
7	Sub Total	82000		5500	**10,350**	
B	**PRELIM &PRE OPE: EXP**	11000	100	0	**11,000**	Nil
C	**WORKING CAPITAL**					
1	Working Capital	89053	0	89053	-	
D	**TOTAL**			**94,553**	**21,350**	
	Less Balance Loan			**49,000**		
E	**SALVAGE VALUE**			**45,553**		
	Note: S.V. = Salvage Value at the end of 10th year.					

ANNEXURE- 2.8								
BINDING WIRE MANUFACTURING PROJECT								
LOAN & INTEREST CALCULATIONS								
		Term Loan			WC Loan		Annual	
No	**Year**	**Prn**	**Int**	**Rep**	**Prn**	**Int**	**Int**	**Rep**
	7		3%			6%		
1		55	0.8	0	49	1.5		
2	1	55	0.8	0	49	1.5	**4.6**	**0**
3		55	0.8	0	49	1.5		
4	2	55	0.8	0	49	1.5	**4.6**	**0**
5		55	0.8	4	49	1.5		
6	3	51	0.8	4	49	1.5	**4.5**	**8**
7		47	0.7	4	49	1.5		
8	4	44	0.7	4	49	1.5	**4.3**	**8**
9		40	0.6	4	49	1.5		
10	5	36	0.5	4	49	1.5	**4.1**	**8**
11		32	0.5	4	49	1.5		
12	6	28	0.4	4	49	1.5	**3.8**	**8**
13		24	0.4	4	49	1.5		
14	7	20	0.3	4	49	1.5	**3.6**	**8**
15		16	0.2	4	49	1.5		
16	8	12	0.2	4	49	1.5	**3.4**	**8**
17		8	0.1	4	49	1.5		
18	9	4	0.1	4	49	1.5	**3.1**	**8**

ANNEXURE- 3												
BINDING WIRE MANUFACTURING PROJECT												
ESTIMATED WORKING RESULTS												
	Year of Operation	**1**	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**	
	Production	80%	90%	90%	90%	90%	90%	90%	90%	90%	90%	
No	**Item**	**In R.O.'000**										**Remarks**
1	**Operating Cost**	370	402	404	406	408	412	414	416	418	421	Ref Annexure 2
2	Expected Sales											
a	Total Sales	392	441	441	441	441	441	441	441	441	441	
3	**Profit before Int & dep**	**22**	**39**	**36**	**34**	**32**	**29**	**27**	**24**	**22**	**20**	Sum of (2-1)
4	Depreciation	10	10	10	10	10	10	10	10	10	10	Ref Annexure 2.7
5	Finance Cost	5	5	5	4	4	4	4	3	3	3	Ref Annexure 2.8
6	**Operating profit**	**7**	**24**	**22**	**20**	**18**	**15**	**13**	**11**	**9**	**7**	Sum of (3 - 4 - 5)
7	Other income if any											
8	Prelim Expenses written off	11	0	0	0	0	0	0	0	0	0	Ref Annexure 2.7
9	Profit/Loss before tax	-4	24	22	20	18	15	13	11	9	7	Sum of (6 - 7 - 8)
10	Income Tax	0	0	0	0	0	2	2	2	1	1	15% from 6th Year
11	**Profit after tax**	**-4**	**24**	**22**	**20**	**18**	**12**	**11**	**9**	**7**	**6**	
12	Statutory reserve		2	2	2	2	1	1	1	1	1	
13	Profit for appropriation	-4	21	19	18	16	11	10	8	7	5	
14	Dividend	0	0	0	0	0	0	0	0	0	0	
15	General reserve	-4	21	19	18	16	11	10	8	7	5	Difference (13) - (14)
16	**Net cash accruals**	**17**	**34**	**32**	**30**	**28**	**23**	**21**	**20**	**18**	**16**	

ANNEXURE- 3.1						
BINDING WIRE MANUFACTURING PROJECT						
ESTIMATES OF SALES REALISATION						
S.No.	**Item**	Unit	**Qty**	**Rate**	**Amount**	**Remarks**
			Annual	RO	**(R.O.)**	
A	**Income**					
1	**Steel wire**	**Ton**	816	600	489,600	
	Total		**816**		**489,600**	

ANNEXURE- 4													
BINDING WIRE MANUFACTURING PROJECT													
PROJECTED CASH FLOW STATEMENT													
	Year of Operation		**1**	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**	
	Production		80%	90%	90%	90%	90%	90%	90%	90%	90%	90%	
	Nos	000											
No	**Item**	**In R.O.'000**											**Remarks**
A	**CASH INFLOW**												
1	Equity	70	0	0	0	0	0	0	0	0	0	0	Ref Annexure 1
2	Profit bef tax & int		0	28	26	24	22	18	16	14	12	10	Ref Annexure 3
3	Depreciation	0	10	10	10	10	10	10	10	10	10	10	Ref Annexure 2.7
4	Prel exp written off		11	-	-	-	-	-	-	-	-	-	Ref Annexure 2.7
5	Increase in Bank Term Loan	55	0	0	0	0	0	0	0	0	0	0	Ref Annexure 1
6	Increase in W C loan	49	0	0	0	0	0	0	0	0	0	0	Ref Annexure 1
7	Other income	0											Ref Annexure 3
8	**Sub Total**	**174**	**22**	**39**	**36**	**34**	**32**	**29**	**27**	**24**	**22**	**20**	**Sum of A1 to A8**
B	**CASH OUTFLOW**												
1	Capital Project expenditure	82	0	0	0	0	11	5	0	0	11	0	Ref Annexure 1& 2.7
2	Other normal cap exp	11											Ref Annexure 1& 2.7
3	Increse in Working Cap:	81	0	7	1	0	0	0	0	0	0	0	Ref Annexure 1.7
4	Decrease in Institu:Loan	0	0	0	8	8	8	8	8	8	8	0	Ref Annexure 2.8
5	Decrease in Other term loan		0	0	0	0	0	0	0	0	0	0	
5	Interest on term loans		2	2	2	1	1	1	1	0	0	0	Ref Annexure 2.8
6	Interest on work cap loan		3	3	3	3	3	3	3	3	3	3	Ref Annexure 2.8
7	Income Tax	0	0	0	0	0	0	2	2	2	1	1	Ref Annexure 3.2
8	Dividend	0	0	0	0	0	0	0	0	0	0	0	Provision
9	Sub Total	174	5	12	13	12	23	19	13	13	23	4	Sum of B1 to B10
10	**OPENING BALANCE**	0	0	17	44	68	90	99	109	122	134	133	
C	**SURPLUS**	**0**	**17**	**27**	**24**	**22**	**9**	**10**	**13**	**12**	**-1**	**16**	Difference(A9)-(B11)
D	**CLOSING BALANCE**	**0**	**17**	**44**	**68**	**90**	**99**	**109**	**122**	**134**	**133**	**149**	

ANNEXURE- 5												
BINDING WIRE MANUFACTURING PROJECT												
INTERNAL RATE OF RETURN ON TOTAL CAPITAL												
	Year of Operation		**1**	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**	
	Production		80%	90%	90%	90%	90%	90%	90%	90%	90%	90%	
No	**Item**	**In R.O.'000**											**Remarks**
A	**CASH INFLOW**												
1	Net Profit bef. Tax		-4	24	22	20	18	15	13	11	9	7	Refer Annexure - 3
2	Depreciation	0	10	10	10	10	10	10	10	10	10	10	Ref Annexure 2.7
3	Prelim Exp written off		11	0	0	0	0	0	0	0	0	0	Ref Annexure 2.7
4	Finance Cost	0	5	5	5	4	4	4	4	3	3	3	Ref Annexure 2.8
5	Salvage Value	0	0	0	0	0	0	0	0	0	0	194	Ref Annexure 2.7
6	Sub Total	0	22	39	36	34	32	29	27	24	22	214	Sum of A1 to A5
B	**CASH OUTFLOW**												
1	Capital Project expenditure	82	0	0	0	0	11	5	0	0	11	0	Refer Annexure - 1
2	Other normal cap exp	11	0	0	0	0	0	0	0	0	0	0	Refer Annexure - 1
3	Working Capital	81	0	7	1	0	0	0	0	0	0	0	Refer Annexure - 1
4	Income Tax		0	0	0	0	0	2	2	2	1	1	Refer Annexure - 3.2
5	Sub Total	174	0	7	1	0	11	7	2	2	12	1	Sum of B1 to B4
C	**NET CASHFLOW (AT)**	**-174**	**22**	**31**	**36**	**34**	**21**	**22**	**25**	**23**	**10**	**213**	
D	**NETCASH FLOW(PT)**	**-174**	**22**	**31**	**36**	**34**	**21**	**24**	**27**	**24**	**11**	**214**	
E	**INTERNAL RATE OF RETURN ON TOTAL INVESTMENT**										**15.51%**		

ANNEXURE- 6													
BINDING WIRE MANUFACTURING PROJECT													
INTERNAL RATE OF RETURN ON EQUITY CAPITAL (AFTER TAX)													
	Year of Operation	**0**	**1**	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**	
	Production		80%	90%	90%	90%	90%	90%	90%	90%	90%	90%	
No	**Item**	**In R.O.'000**											**Remarks**
A	**CASH INFLOW**												
1	Net Profit before Tax	0	-4	24	22	20	18	15	13	11	9	7	Refer Annexure- 3
2	Depreciation	0	10	10	10	10	10	10	10	10	10	10	Refer Annexure - 2.7
3	Prelim Exp written off	0	11	0	0	0	0	0	0	0	0	0	Refer Annexure - 2.7
4	Salvage Value	0	0	0	0	0	0	0	0	0	0	194	Refer Annexure - 2.7
5	Sub Total	0	17	34	32	30	28	25	23	21	19	211	Sum of A1 to A4
B	**CASH OUTFLOW**												
1	Equity	70	0	0	0	0	0	0	0	0	0	0	Refer Annexure - 1
2	Fixed Assets	0	0	0	0	0	11	5	0	0	11	0	Refer Annexure - 1
3	Working Capital	0	0	7	1	0	0	0	0	0	0	0	Refer Annexure - 1
4	Loan Instalment	0	0	0	8	8	8	8	8	8	8	0	Refer Annexure - 2.8
5	Income Tax	0	0	0	0	0	0	2	2	2	1	1	Refer Annexure - 3.1
6	Sub Total	70	0	7	8	8	19	15	10	10	20	1	Sum of A1 to A5
C	**NET CASHFLOW**	**-70**	**17**	**27**	**24**	**22**	**9**	**10**	**13**	**12**	**-1**	**210**	
D	**INTERNAL RATE OF RETURN ON EQUITY INVESTMENT**								**30.55%**				

ANNEXURE- 7													
BINDING WIRE MANUFACTURING PROJECT													
PROJECTED BALANCE SHEET													
	Year of Operation		**1**	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**	
	Production		80%	90%	90%	90%	90%	90%	90%	90%	90%	90%	
No	**Item**	**In R.O.'000**											**Remarks**
A	**ASSETS EMPLOYED**												
1	Fixed Assets												
a	Gross Fixed Assets	82	82	82	82	82	93	98	98	98	109	109	Refer Annexure - 2.7
b	Preliminary expenses	11	0	0	0	0	0	0	0	0	0	0	Refer Annexure- 2.7
c	Acc. Depreciation	0	10	21	31	41	52	62	72	83	93	104	Refer Annexure - 2.7
d	Net Fixed Assets	93	72	61	51	41	41	36	26	15	16	6	
2	Current Assets												
a	Cash	0	17	44	68	90	99	109	122	134	133	149	Refer Annexure - 4
b	Other Cur. Assets	81	81	88	89	89	89	89	89	89	89	89	Refer Annexure - 1.7
c	Total Cur. Assets	81	98	132	156	178	188	198	211	223	221	238	
3	Less: Cur. Liabilities	0	0	0	0	0	0	0	0	0	0	0	
		174	**170**	**193**	**207**	**219**	**229**	**234**	**237**	**238**	**237**	**243**	
B	**FINANCED BY**												
1	Equity	70	70	70	70	70	70	70	70	70	70	70	Refer Annexure - 1
2	Statutory reserve		0	2	5	7	8	10	11	12	12	13	
3	General reserves	0	-4	17	37	54	71	82	92	100	106	112	Cu.NP-Cu.Divident
4	Other term loan	0	0	0	0	0	0	0	0	0	0	0	Refer Annexure - 2.8
5	Institutional Finance	55	55	55	47	40	32	24	16	8	0	0	Refer Annexure - 2.8
6	Bank Borrowings	49	49	49	49	49	49	49	49	49	49	49	Refer Annexure - 2.8
		174	**170**	**193**	**207**	**219**	**229**	**234**	**237**	**238**	**237**	**243**	

ANNEXURE- 8											
BINDING WIRE MANUFACTURING PROJECT											
RATIO ANALYSIS											
	Years of Operation	**1**	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**
A	**COST RATIOS**										
1	Raw Material / Total Sales	50.1%	50.1%	50.1%	50.1%	50.1%	50.1%	50.1%	50.1%	50.1%	50.1%
3	Utilities / Total Sales	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%	8.3%
4	Factory wages / Total Sales	15.1%	13.6%	13.8%	14.0%	14.2%	14.4%	14.6%	14.9%	15.1%	15.3%
5	Prime Cost / Total Sales	73.5%	72.0%	72.2%	72.4%	72.6%	72.8%	73.1%	73.3%	73.5%	73.7%
6	Factory exp. / Total Sales	10.4%	9.4%	9.4%	9.4%	9.5%	9.8%	9.8%	9.8%	9.8%	9.8%
7	Factory Cost / Total Sales	83.9%	81.4%	81.7%	81.9%	82.1%	82.7%	82.9%	83.1%	83.3%	83.6%
8	Administrative exp. / Total Sales	6.1%	5.5%	5.7%	5.9%	6.0%	6.2%	6.4%	6.6%	6.7%	6.9%
9	Selling exp. / Total Sales	4.5%	4.3%	4.4%	4.4%	4.5%	4.6%	4.7%	4.8%	4.9%	5.0%
10	Finanace Cost / Total Sales	1.2%	1.0%	1.0%	1.0%	0.9%	0.9%	0.8%	0.8%	0.7%	0.7%
11	Non-Cash exp. /Total Sales	5.5%	2.3%	2.3%	2.3%	2.3%	2.3%	2.3%	2.3%	2.3%	2.3%
12	Total Cost / Sales	101.1%	94.6%	95.1%	95.5%	95.9%	96.7%	97.1%	97.6%	98.0%	98.5%
B	**PROFITABILITY RATIOS**										
1	PBDIT / Sales	5.6%	8.8%	8.3%	7.8%	7.4%	6.5%	6.0%	5.6%	5.0%	4.5%
2	Operating profit / Sales	1.7%	5.4%	4.9%	4.5%	4.1%	3.3%	2.9%	2.4%	2.0%	1.5%
3	PAT / Sales	-1.1%	5.4%	4.9%	4.5%	4.1%	2.8%	2.5%	2.1%	1.7%	1.3%
4	PAT / Investment	-3.3%	18.9%	17.3%	15.9%	14.4%	9.9%	8.6%	7.3%	6.0%	4.5%

ANNEXURE- 9				
BINDING WIRE MANUFACTURING PROJECT				
BREAK EVEN ANALYSIS				
S. No.	**Item**	**Year 1**	**Year 6**	**Remarks**
	In R.O. '000			
A	**FIXED COST**			
1	Production Wages	59	64	Refer Annexure - 2
2	Factory Overhads	3	3	Refer Annexure - 2
3	Misc. Factory Exp.	6	7	Refer Annexure - 2
4	Admin. Expenses	24	25	Refer Annexure - 2
5	Sales Expenses	18	20	Refer Annexure - 2
6	Depreciation	10	10	Refer Annexure - 2
7	Prelim. Expenses written off	11	0	Refer Annexure - 2
8	Financing Cost	5	4	Refer Annexure - 2
9	Income Tax	0	2	Refer Annexure - 2
10	Sub Total	136	136	
B	**VARIABLE COST**			
1	Raw materials	196	221	Refer Annexure - 2
2	Utilities	32	37	Refer Annexure - 2
3	Misc. Expenses	0	0	
4	Sub Total	229	257	
C	**SALES**	392	441	Refer Annexure - 3
D	**CONTRIBUTION**	163	183	Difference C - B
E	**BREAK EVEN POINT**	83.4	74.1	As % of Production
		66.7	66.7	As % of Plant Capacity
F	**CASH BEP**	70.3	68.5	As % of Production
		56.2	61.6	As % of Plant Capacity

ANNEXURE- 10					
BINDING WIRE MANUFACTURING PROJECT					
SENSITIVITY ANALYSIS (IRR FOR 10 YEARS)					
		Projection	**Change in One**		
S.No.	**Item**	**No Change**	**Variable at a Time**		
A	**VARIABLE**		Volume	R. M	Sales
			Nos	Cost	Value
B	**PESSIMISTIC**				
	Change		**-5%**	**5%**	**-5%**
D	**I R R - PESSIMISTIC PROJECTION**				
1	**I R R on Investment**	15.5%	10.2	9.1	2.7
2	**I R R on Equity**	30.5%	19.2	17.0	5.3

ANNEXURE- 11												
BINDING WIRE MANUFACTURING PROJECT												
DEBT SERVICE COVERAGE RATIO												
	Years of Operation	**0**	**1**	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**
	Production in (%)		80%	90%	90%	90%	90%	90%	90%	90%	90%	90%
	Nos	000										
No	**Item**	**In R.O.'000**										
1	Profit after tax		-4	24	22	20	18	12	11	9	7	6
2	Depreciation		10	10	10	10	10	10	10	10	10	10
3	Prelimnery exp. Written off		11	0	0	0	0	0	0	0	0	0
4	Interest		5	5	5	4	4	4	4	3	3	3
5	Total		22	39	36	34	32	27	25	23	21	19
1	Annual repayment		0	0	8	8	8	8	8	8	8	0
2	Interest		5	5	5	4	4	4	4	3	3	3
3	Total		5	5	12	12	12	12	12	11	11	3
	D.S.C.R		4.73	8.38	2.93	2.82	2.71	2.26	2.15	2.03	2	6
	WT. AVERAGE D.S.C.R	**2.83**										