



Feasibility Study and Business Plan for the Unst Partnership

Community Owned Spinning Mill

**Compiled by Phil Brown
Consultant
August 2010**

**The Pool - DTA Scotland Consultancy CIC
54 Manor Place
Edinburgh
EH3 7EH**

Contents

1. Executive Summary	2
1.1 Introduction	2
1.2 Development Proposal	2
1.3 Business Profile	3
1.4 Evidence of Community Need	3
1.5 Community Economic Benefit	3
1.6 Development Sustainability	3
1.7 Operating Framework	3
1.8 Finance and Funding	4
1.9 Overall Conclusion	4
2. Introduction & Background	5
2.1 Unst Profile	5
2.2 Unst Partnership	7
3. Community Spinning Mill	10
3.1 Background	10
3.2 Business Model	10
3.3 Dimensions of Business	10
3.4 Basic Profitability	11
4. Capital Project	12
4.1 Site and Buildings	12
4.2 Services	13
4.3 Potential Sites	14
4.4 Site Location	15
4.5 Plant and Equipment	15
4.6 Budget Capital Cost	16
4.7 Finance and Funding	16
5. The Proposal	17
5.1 Business Model	17
5.2 Market Research	17
5.3 Market Segments and Products	18
5.4 Sales and Marketing Strategy	20
5.5 Business Structure	21
Appendix A –Flow Process Chart	23
Appendix B – Budget Project Cost	24
Appendix C – Three Year Cash Flow Analysis	25
Appendix D – Big Lottery Funding Notes	26

1. Executive Summary

1.1 Introduction

The Unst Partnership Ltd and the Community Council were made aware that Shetland Organics Producers' Group had researched the possibility of establishing an organic micro-spinning mill in Shetland. The prime interest of SOPG was in the use of the yarn and propagating organic natural wools in garment manufacture. Subsequently, SOPG formed a trading arm, ShetlandOrganics Community Interest Company incorporated in November 2008. They were looking for a community partner to take forward the mill project on the basis that ShetlandOrganics would become the principle customer for the yarns manufactured and under community ownership the mill could produce for other local demand.

The Unst Partnership and Community Council are interested in the proposal as it has the potential to create jobs and generate income for the community against a background of a stagnant island economy. It would also start the Partnership on the road to meeting their broader objective for the local economy and allow them to take the first steps to become active in trading and developing a brand for Unst. To take the project forward the community has to examine the idea in more detail and establish whether, and if so how, it could be made to work on Unst. A satisfactory conclusion would allow the Unst Partnership Ltd to seek the appropriate funding to deliver the project.

1.2 Development Proposal

The project would develop a site for a spinning mill to meet the business proposal. This site would be located in or near to Uyeasound for strategic and logistical reasons. The site would include a visitor facility since, although this facility is not integral to the sustainability of the spinning mill business, it represents an opportunity to create a contribution to tourism on the island and generate a wider contribution to the local economy, with much of the operating cost absorbed by the spinning mill business.

The proposal allows for the creation of the following spaces:

Type	Description
Fleece Storage and Preparation	A storage and manufacturing area to include fleece preparation and washing amounting to a total of 150 sq m.
Pre-spinning and Spinning Manufacturing.	An area of 150 sq m to include an office facility and two departments for pre-spinning (felt, batts and roving) and spinning and winding.
Visitor Facility	An area of 150 sq m to include a shop or sales space and an office.
Water and Effluent Facilities	A system including water collection, storage and treatment. With water storage of approximately 600 cu m.
Car Parking and Vehicle Access	A customer and staff car park for 10 cars with separate vehicular access for deliveries and shipping.

1.3 Business Profile

The Mill would be set up to produce yarns for specialist users in specific market segments. Typically this production would be low volume batch production of specialist yarns which would demand premium pricing in the market place. The ShetlandOrganics production would be part of this type of production even though it represents a significant percentage of the total production of the mill. Although not confirmed the ShetlandOrganics business would by its nature involve runs of different yarns in small batches as it represents the needs of individual members of the association.

Niche Markets which would be supplied include craft, hobbies, reproduction (historic fabrics), local lace making, leading edge designers, colleges and manufacturing samples.

The accent on products would be to offer traditional yarns; the equipment of the mill would be cottage industry status, so the products could be aimed at the “hand spun” end of the market place. This will include supplying naturally coloured yarns using the fleece colour or using natural dyes only.

1.4 Evidence of Community Need

The Unst Partnership has undergone an intense community consultation which started from the investigation of a community buy out of the Saxa Vord resort and developed into the realignment of the Unst Partnership to the community and the development of the new objectives and business plan. Hence the objectives of local economic stimulation and job creation rise directly from community consultation.

Community reaction to the spinning mill project was not part of the brief of this study, but now the project has achieved its present level of definition, community consultation is the next step to be taken. The Unst Partnership need to take the ideas to the community but also look for and evaluate other ideas the community may have on how the objectives may be achieved without the spinning mill project. This particular solution to meeting the identified community need has to be evaluated against any alternatives.

1.5 Community Economic Benefit

The spinning mill business, on the predicted three year forecast will create four full time jobs within the three year period, starting at two full time equivalents. In the same period it will generate a turnover for the local economy of over £400,000.

It will create indirect opportunity in services, maintenance, cleaning and tourism which are more difficult to tie back to specific jobs or defined economic benefit, but which are real nonetheless.

1.6 Development Sustainability

The basic business model shows the potential for good profitability if the business is run professionally. Since it is to be a community owned venture, the business model allows some of this profitability to be sacrificed; supporting a non-profit making tourism offering which will benefit the larger community, and to provide development capital for other Unst Partnership trading initiatives.

1.7 Operating Framework

The Unst Partnership is an established organisation, registered as a Company Limited by Guarantee.

It is constituted in community representation; as such it can access funding to develop the community and assets for the community. Since the heart of the project is asset development, it already in the position to own the assets, and trade as a business. However this is not necessarily the best way of proceeding and the Unst Partnership has already identified and evaluated the idea of setting up a wholly owned trading subsidiary.

To protect the asset created the property will be owned by the Unst Partnership and be managed by a newly created wholly owned trading subsidiary. In this structure the trading subsidiary would be a share based Community Interest Company.

If the project is progressed a monitoring and evaluation system will need to be established to create and measure the targets and outcomes over time and report these to the key funders, stakeholders and Board of the Unst Partnership.

1.8 Finance and Funding

A funding strategy for the development needs to be prepared based on the capital and development costs identified.

Potential main funders would be SRDP and Big Lottery GCA 2. Both offer grants for capital projects of up to £1M. Both of these would want other funders to be on board and a portfolio of secondary funders would need to be engaged. Secondary funders could include Community Enterprise Scotland as well as private trust funds such as Lankelly Chase, Robertson Trust and Esmee Fairburn. An amalgam of funding partners will be required depending on the final level of funding necessary. All of the funders above are likely to provide both capital funding as well as the revenue funding identified in the cash flow forecast.

Big Lottery Investing in Communities, Growing Community Assets should be considered as a prime potential funder. Notes on the programme are given in Appendix D

There is the possibility that the project could generate some interest from private investors. It is equally possible that some loan funding could be factored into the funding package from banks sympathetic to community enterprise such as Triodos Bank.

There will be an initial requirement for development funding to progress the project before the definitive capital proposal can be made. The Big Lottery GCA programme is geared to provide this funding.

1.9 Overall Conclusion

It is from this basis that the Unst Partnership believes that this Business Plan presents a compelling case for the establishment of a new Community Spinning Mill as a viable vehicle for community economic regeneration and future development activity on Unst.

2. Introduction & Background

2.1 Unst Profile

Geography and Demography

The Shetland Islands are the most northerly local authority area in the UK, 298 miles north of Edinburgh, 211 miles north of Aberdeen and the Shetland mainland is at least 50 miles north of Orkney, their closest neighbours. Shetland is only 228 miles from Torshavn in Faroe and a similar distance from Bergen in Norway. Shetland comprises more than 100 islands, of which 15 are inhabited with a total population of 22,000. Unst is Shetland's most northern Island, and the most northerly populated isle in Britain. It is roughly 12 miles long by 5 miles wide with an intricate landscape of heathery hills, peat bog, farmland, cliffs and beaches. The largest settlement in Unst is Baltasound. Other main settlements include Uyeasound in the south and Haroldswick in the north. The current population stands at around 620.

Infrastructure

Unst is connected to the island of Yell by a regular free ferry service. The crossing from Gutcher in Yell to Belmont in Unst takes 10 minutes. There are 2 primary schools on Unst, one in Uyeasound and one in Baltasound, which is part of the Baltasound Junior High School. The Junior High School also incorporates a nursery department, which serves the whole island. The Junior High School secondary department educates children from Secondary One to Secondary Five.

The majority of community infrastructure is based in Baltasound, including the Leisure Centre, Health centre, Care Centre, Police and Fire Services, a marina, and a busy working pier. There are 3 community halls in Unst. The area has a good network of well-maintained roads and subsidised ferry links to Yell and Fetlar. There is a daily bus service to and from Lerwick from Monday to Saturday. Due to the closure of RAF Saxa Vord, there is some social housing still available in Unst. A community operated Heritage Centre and the Boat Haven are located in Haroldswick. HIE have five business units located in the centre of Unst, of which one is currently vacant. There are three churches in Unst, both Church of Scotland and Methodist.

Key Challenges

As with many rural and sparsely populated areas, Unst's key challenges are centred on population decline; a lack of employment opportunities; and a lack of access to services through the loss or centralisation of resources.

Declining Population

All three of the North Isles have been in population decline since 1981, with fairly rapid decline seen since 1991. Although Shetland's population as a whole shows signs of stabilising, it is estimated that the population of the North Isles as a whole will continue to decline. Unst's population has decreased from 1200 in 1991 to a current total of 620 which is largely due to closures of the airport and RAF Saxa Vord.

Lack of Employment Opportunities

The closure of the RAF base at Saxa Vord resulted in the loss of 119 jobs (105 FTE), and a lack of employment opportunities continues to be a challenge facing Unst and the North Isles. There is a marked lack of childcare facilities in the North Isles which impacts upon access to employment and learning opportunities for parents and carers.

Loss / Centralisation of Resources

The impact of these factors has been greatly accelerated in Unst due to three major economic setbacks (between 1995 and 2006); the closure of the airport (in 1996), the rundown of the RAF (1999-2001), and subsequent announcement of closure of the RAF base at Saxavord (2005). Unst's economically fragile status was recognised through its designation as part of the 'Initiative at the Edge' between 2004 and 2008. The island remains in an economically fragile position, and the knock-on effects of the closures are still being felt. In the last 15 years, for example, Haroldswick has lost a shop, a post office, and a school. Shetland Islands Council are presently reviewing the status of Uyeasound Primary and Baltasound Secondary Schools.

Economic and Social Profile

Economic Activity, Inactivity and Employment

Unemployment is relatively low in Unst, with numerous residents having two or more part time jobs. However, new job vacancies seldom arise, and are much sought after.

Economic Activity by Age (Residents aged 16-74)									
Age	16-17	18-19	20-24	25-34	35-54	55-59	60-64	65-74	Total
Employee	4	20	46	141	385	65	38	3	702
Self-employed	1	0	11	22	66	14	16	9	139
Full-time students	0	3	2	4	25	6	2	0	42
Unemployed	3	1	0	0	1	0	1	0	6
Economically Inactive	10	0	7	25	71	46	59	160	378
Total	18	24	66	192	548	131	116	172	1,267

Table 1 - Economic activity by age(2001).

Economically Inactive (Residents aged 16-74)			
	Male	Female	Total
Retired	93	114	217
Student	4	8	12
Looking after home/family	5	61	66
Permanently sick/disabled	37	18	55
Other	20	18	38
Total	159	219	378

Table 2 - Economic inactivity by age(2001).

The Business Base

The main employers in Unst are the local authority, and the aquaculture industry (salmon farming, mussel farming and shellfish boats). Shetland Islands Council provides employment in schools, ferries, roads, social care, community work and natural heritage. Jobs in this sector are sought after, as they are mostly well paid and relatively secure. A very small number of people take the 2 hour commute daily to Lerwick and the central mainland for employment, whilst more commute to Yell

and Sullom Voe in the north of Shetland. Crofting remains integral to the community way of life, and there are still over 300 crofts in Unst. Other employers include a local building firm, a haulage company, 3 retail outlets, tourism and hospitality businesses, a printing company, a brewery, North Isles Childcare, Shetland Recreational Trust and Shetland Amenity Trust.

Sector	FTEs
Accommodation & Catering	14
Business Services	1
Construction	3
Fisheries & Agriculture	20
Manufacturing	16
Public Health, Admin, Social Work, Other	61
Transport & Communications	10
Wholesale & Retail	18
Total	143

Table 3 - Employment by Sector in Unst (2007).

2.2 Unst Partnership

Unst Partnership was set up in 1999/2000 in response to a series of economic crises that affected Unst during that decade. The Unst airport had closed (1996) and the Ministry of Defence had just announced a major drawdown of staff at RAF Saxa Vord (1999). Both of these events caused a great deal of local unemployment, local people leaving to seek work and a severe impact on the island economy. Unst Partnership was set up with the following objects;

1. To relieve poverty and unemployment among the residents of Unst
2. To advance education among the residents of Unst, particularly among young people and the unemployed
3. To promote and/or provide training in skills for all kinds, particularly such skills as will assist residents of Unst in obtaining paid employment
4. To promote, establish and operate other scheme of a charitable nature for the benefit of the community within the Shetland Islands
5. To promote trade and industry for the benefit of the general public

The Partnership was funded for three years by Shetland Island Council and Shetland Enterprise(HIE) with a full time manager, admin secretary and office premises at Hagdale, Unst. Directors included the Chief Executive of SIC; the Convener of SIC; and representatives from; SIC Economic Development Dept, Shetland Enterprise; SIC Council and three representatives from the Unst Community Council.

During those three years, a number of developments took place in Unst. Baltasound pier was built, the Care Centre was completed and the Amenity Trust squads for “Muck and Bruck” and for Building renovation were set up. The Unst Animation Studio, using equipment purchased through UP, used two units at Hagdale Industrial estate. It employed 10-12 people at one stage but eventually foundered due to a lack of income earning projects. Unst Partnership was involved in commissioning various feasibility studies into employment projects at this time, including a Study Centre at Saxa Vord and Setters Hill estate, a Café at Burrafirth, a Food Processing “Barn” and a North Isles Slaughterhouse, but none proved economically viable.

In 2004 the MOD announced complete closure of RAF Saxa Vord by the following year. This led to several public meetings on the island and the setting up of the Unst Response team (later North Isles Response team), a branch of HIE specifically aimed at assisting Businesses and Community groups. It was led by two employees of HIE and an Admin secretary. Unst Partnership continued to exist but was no longer seen as the main player in Community Development and received no core funding. The Organisation considered closing - but then began to get involved in Project work, principally the funding of the PURE project.

Assets and Income

The PURE project proved to be a successful and the Unst Partnership was able to apply for grant aid to purchase the equipment used by PURE to this day. The value of those assets (two 15 KW wind turbines, electrolyser and hydrogen conversion equipment) has allowed the Partnership to apply for other grant projects since then. Much of the work has involved renewable energy – and the reduction of debts incurred by the Partnership when uninsured damage was done to very specialised Hydrogen equipment.

The Partnership has in the past received some income from providing a printing and photocopying service for its office at Hagdale. This service and the office ceased from June 2008 to reduce costs. Unst Partnership presently has one part-time employee, a Community Powerdown Officer funded through Community Energy Scotland and Keep Scotland Beautiful, in post from April 2009 –March 2011. The Partnership has no other paid staff and no office, the main address being the Chairman's house.

The Unst Response Team project effectively came to an end in the summer of 2008. At the end of that year a report by AB Associates was commissioned by HIE into the use of grant aid in Unst over the previous ten years. Among its recommendations, it highlighted the need for the community to “Reconstitute or re-invigorate Unst Partnership – through training, finding new roles, constitution and membership”.

Saxa Vord Feasibility Study

In May 2009, the Unst Community Council asked Unst Partnership to examine the feasibility of a community buy-in to Saxa Vord LLP (Limited Liability Partnership), the accommodation and restaurant business that was established by Military Assets Management upon their purchase of the RAF camp buildings. The community council made this request in recognition of the importance of this business to the Unst economy and the need to consider whether Saxa Vord could be supported by the community to continue to provide this important tourist service for Unst.

With funding from Leader, Shetland Islands Council and the Big Lottery, Unst Partnership appointed The Pool, the consultancy arm of the Development Trusts Association for Scotland to conduct this work. A number of well-attended public meetings were held to gauge community support for this idea. Following the completion of an analysis of the Saxa Vord business by the Pool consultants, a key community meeting was held in May 2009, which over 80 people attended. The consultants informed the community that there was simply not enough visitors coming to Unst or staying for long enough to lead them to conclude that it was a sensible idea for the community to buy into the Saxa Vord business at this time. The consensus was therefore reached that a community buy-in was not the best solution. However overwhelming majority of those present felt that Saxa Vord was a vital part of Unst's economy that should be supported, perhaps not directly, but through indirect action through the stimulation of Unst's economy as a whole.

Taking the views of the wider community in hand, Unst Partnership, together with the Pool, put forward an alternative proposal for the second stage of the funded feasibility study. This second stage would look at the wider economic picture, establishing what Unst needed as an island in order to stimulate the economy, create jobs, and secure the future sustainability of the island. This option was approved by the overwhelming majority of the community members present. Following this meeting, two priority steps were identified; firstly to widen and increase the membership of Unst Partnership in order to ensure a more representative body for the community and secondly; to identify and implement priorities for action that will benefit the economy of Unst.

Constitutional changes and membership drive

Previous membership categories to the Unst Partnership were for public bodies rather than individuals. It was decided that Unst Partnership needed to revise its constitution by introducing a new category of membership that would allow anyone registered to vote in Unst to join the partnership. It was also decided that the Partnership should seek elect the full compliment of 10 Directors. A successful public election was held in November 2009, which led to the appointment of ten new Directors and the approval of the new category of membership. The number of members of the Partnership almost doubled on the night of the election; this number is still increasing thanks to the Partnership's membership drive and the current figure stands at ***.

Unst Partnership Economic Objectives and Strategy

In their 3 year business plan the Unst Partnership has the stated economic objective of;

Objective 1 – Economy

To develop the economy of Unst by creating the opportunity for increased trade for existing businesses and creating a business environment to encourage and nurture new businesses, with the specific intention of creating employment opportunity.

The declared strategies for achieving this objective are;

- Develop the newly established groups to encourage shared ideas and cooperation in the areas of tourism, arts and craft, food and drink manufacture, ecology and renewable energy.
- Develop the ideas, and work to create, a wool micro-spinning mill as a community owned venture.
- Develop a trading company which works to create a brand and markets for Unst products, develops new product ideas with existing producers and providers, and encourages new businesses to become involved in providing products and services through the Unst brand.
- Develop a business centre, particularly aimed at creating an environment conducive to the development and growth of small and new businesses. The centre will provide accommodation, infrastructure and business services.

The Unst Partnership sees an opportunity to develop the local economy through the Spinning Mill project.

3. Community Spinning Mill

3.1 Background

The Unst Partnership Ltd and the Community Council were made aware that Shetland Organics Producers' Group had researched the possibility of establishing an organic micro-spinning mill in Shetland. The prime interest of SOPG was in the use of the yarn and propagating organic natural wools in garment manufacture. Subsequently, SOPG formed a trading arm, ShetlandOrganics Community Interest Company incorporated in November 2008. They were looking for a community partner to take forward the mill project on the basis that ShetlandOrganics would become the principle customer for the yarns manufactured and under community ownership the mill could produce for other local demand.

The Unst Partnership and Community Council are interested in the proposal as it has the potential to create jobs and generate income for the community against a background of a stagnant island economy. It would also start the Partnership on the road to meeting their broader objective for the local economy and allow them to take the first steps to become active in trading and developing a brand for Unst. To take the project forward the community has to examine the idea in more detail and establish whether, and if so how, it could be made to work on Unst. A satisfactory conclusion would allow the Unst Partnership Ltd to seek the appropriate funding to deliver the project.

3.2 Business Model

The Mill would be set up to produce yarns for specialist users in specific market segments. Typically this production would be low volume batch production of specialist yarns which would demand premium pricing in the market place. The ShetlandOrganics production would be part of this type of production even though it represents a significant percentage of the total production of the mill. Although not confirmed the ShetlandOrganics business would by its nature involve runs of different yarns in small batches as it represents the needs of individual members of the association.

Niche Markets which would be supplied include craft, hobbies, reproduction (historic fabrics), local lace making, leading edge designers, colleges and manufacturing samples.

The accent on products would be to offer quality yarns; the equipment of the mill would be cottage industry status, so the products could be aimed at the bespoke end of the market place. This will include supplying naturally coloured yarns using the fleece colour or using natural dyes only.

3.3 Dimensions of Business

By establishing basic dimensions for the business the business model can be developed to establish viability. The basic dimensions are drawn from the initial work done by Shetland Organic Producers Group as their intention is to be the major customer (50% in their report). Applying production rates into a simplistic model the following dimensions can be derived.

- Output - 2.5 kg per hour 230 days per year, 7hours per day = 4,025 kg
- Price Structure = £38.00 (as estimated in SOPG study) to £65.00 per kilo.

- Turnover = £128,800 to £262,000 pa.
- Fleeces = 6,200
- Organic Fleeces = 2,000
- Business is one third Organic, two thirds Non-organic

The SOPG sales price estimate seems to be half what the hobby / specialist yarn market can demand. The selling price for a bulk customer can be expected to be lower than supplying niche markets, but this price may need to be challenged should the project proceed.

3.4 Basic Profitability

Cost of Materials

Currently fleeces are being given away, but it cannot be presumed that this situation will last forever so some recognition needs to be made for a future cost of fleeces. It is not clear if ShetlandOrganics will wish to charge for fleeces, or issue them free of charge against a reduction in the final cost. A cost of 50p per fleece will be used for this exercise.

- Cost of fleeces - 50p per fleece
- Yields 650g of yarn (as estimated in SOPG study)
- Fleece cost per kg yarn = **77p**; ***87p**; ****95p**.

* If sold on a cone + cost of cone.

**If dyed plus cost of dye and waste disposal

Cost of Direct Labour

The cost of labour is based on employing two full time equivalent staff paid at £10.00 per hour and working 35 hours per week; this labour would be achieving a production rate of 2.5 kg per hour.

- Cost of employment per full time employee = £12.43 per hr (230 days per year, 10% NI)
- Two full time equivalent employees = £24.86 / hr; producing 2.5 kg / hr
- Labour cost per kg = £9.94

Overheads

The business could be run with very little overhead, but for the purposes of basic viability it is better to assume overhead will be high relative to manufacturing costs. This will mean there is a more than adequate return to enable the business to develop. It will allow money to be spent on advertising and promotion as well as covering service costs and maintenance. For the purpose of this exercise a

ratio of 1.5 to 1.0 will be taken as the ratio of overhead cost to manufacturing cost. This gives an overhead cost of £16.33 per kilo.

Manufacturing Cost

Adding together the three cost elements; materials, direct labour and overhead gives the manufacturing cost which in this model is £27.22 per kg. This can be considered as the break even selling price, and any selling price in excess of this will generate profit.

Profitability

At the basic selling price identified in the SOPG study the net profit on yarn sales at £38.00 per kilo selling price would be 28%. This would be a very good profit margin for this type of business. It is almost certainly created by the niche market approach. It also means that the figures generated have latitude of flexibility without compromising the basic profitability.

The basic figures that have been used are for a two ply yarn, which will run at the output of 2.5 kg per hour which underpins the figures. Lighter weight yarns will proportionally cost more to manufacture as the manufacturing costs will be the same but the throughput will drop. However these yarns will demand higher prices in the market place and profitability can be maintained.

This simplistic analysis of the profitability indicates that the spinning mill would be basically viable, and the identified profitability is sufficiently high to absorb hidden costs which may be discovered in a deeper analysis.

A basic three year cash flow analysis is shown in Appendix C.

4. Capital Project

4.1 Site and Buildings

Mill Space Requirement

The layouts proposed in the SOPG study were based on an area of approximately 150 sq m. This was based on the simple concept of an open shed. No (or very little) allowance has been made for work in progress or material storage in these layouts. To facilitate efficiency and storage it is suggested that the mill be laid out in divided areas; these would be fleece preparation (dagging, sorting, washing and opening), pre-spinning and felting (carding, roving, rug yarn, batting and felting) and spinning (drafting, spinning, plying, steaming and winding skeins balls and cones).

Between these departments there would be work in progress materials storage. In this way none specific processing can be carried out in terms of preparing basic materials which would speed up the response to processing customer orders. The system would allow the mill to be operated closer to a "Just In Time" model.

Allowing for this, as well as accommodating the equipment the mill would need the extra space for material storage (25 sq m), work in progress (15 sq m), a packing and finished product store (25 sq m) and an office space (10 sq m). This would bring the total space required to 225 sq m.

It would also be advisable to allow for some expansion in the future. The creation of the mill should be viewed as an investment of ten years minimum, and so allowance to expand the business in terms of manufacturing capacity should be built into the model. This means a building requirement for the mill of around 300 sq m. (3000 sq ft) should be considered the minimum.

Visitor Space

Although the basic profitability can be achieved by trading in yarn, the opportunity to benefit tourism on the island should not be ignored. Plans for the site should include some visitor accommodation both to give information on the mill (including tours) and a shop offering yarn and exhibiting and selling cloth and garments made from the yarns.

A shop with display space storage and staff office and facilities would require another 150 sq m approximately. This brings the building space requirement to around 450 sq m (single story construction). To put this in context the hatchery shed in Uyeasound (an identified potential site) is 162 sq m.

Total Site Space

With 450 sq m of covered space (single story construction), the site will need space for parking for visitors as well as separate commercial vehicle access. Depending on site layout, the site will need to be about 1000 sq m (0.1 hectare) minimum. Other consideration which may or may not have an impact on the site and space are water consumption and effluent as well as renewable power.

4.2 Services

Power

The power requirement for the equipment is single phase with a total of 80 amps for 2.5 kg/hr production if all machines in the plant are run together. In fact the individual machine capacities are such that this could occur especially if work in progress storage is adopted. This would indicate a power requirement of 20 kW. This is a simplistic analysis, and the same strategies with respect to future expansion apply to power as well as space. In terms of commercial power supplies it would be best to consider a 3 phase supply fused at 60 amps (40 kW).

The use of renewable energy is a priority consideration for the project, and although definitive figures are yet to be available, Pure have been approached about renewable energy sources. They are keen to tie the Uyeasound site (if this is chosen) into a district scheme supplying a number of users. This will be explored and equated to other alternatives.

Water

Water consumption needs to be assessed, as does effluent processing. Process water (washing) should ideally be from stored rainwater for organic production. The process has a relatively high water usage, with an annual requirement of 575 cubic meters even after recycling in the washing process. If the roof area of the buildings is the 450 sq m identified (single story) there is the potential to collect around 550 cubic meters per annum based on average annual rainfall for Lerwick.

Obviously this would need some form of storage system the capacity of which should be around 600 cubic meters.

Effluent

Effluent will need consideration since the waste washing water will contain lanolin as well as the dirt from the fleece. The lanolin can be separated by fat separators, but with the high water consumption and the fact that it exceeds the rainfall, it may be worth looking at a settlement system where the fat is skimmed from the top and the dirt settles to allow more recycling of the wash water.

There are also issues with sites in Uyeasound since the natural watercourse would drain into Easter Loch which is a Site of Special Scientific Interest. There is also the consideration of the disposal of dyestuffs. Although only natural dyes will be used they will not be allowed straight into the effluent system. However the volume is so low that they can be captured into independent storage and disposed of through commercial waste disposal channels.

4.3 Potential Sites

Uyeasound

A proposed site nominated for consideration is the hatchery shed (162 sq m) at Uyeasound which stands on approximately 800 sq m of land.

There would be a need to add buildings but main shed could be used for roving and spinning with additional building for fleece storage and preparation plus offices.

The visitor facility would need to be housed in another building (150 sq m) which would mean two additional buildings would need to be constructed as well as modification to the existing building for insulation and partitioning. Additional land would be required to add to the site but as well as the existing site being available for purchase enquiries revealed the adjacent land could be acquired.

Saxa Vord

There are a number of buildings disused on the Saxa Vord site. The ones which could, by virtue of their size, be considered for development are on the part of the site away from the accommodation blocks and adjacent to where the Valhalla Brewery is relocating. A simple assessment of the potential of these buildings causes them to be rejected on obvious grounds.

- Community Centre plus Penguin Club buildings – the size is sufficient but the state of the existing buildings is very poor. They are behind the old gymnasium building which is an eyesore unless also developed.
- The size of the gymnasium is suitable but again the building is in a poor state of repair. The site is unobstructed from main road with parking space behind.
- The stores building is in a good state of repair but is far above the required size (1200 sq m plus extra space on a first floor). To justify the cost and overhead there would need to be other usage or sub-letting.

The first two options could only figure in this development if the buildings were demolished and the sites treated as brown field. This almost puts them into a new build scenario, as the only benefits over a Greenfield site would be the services connections and the comments below then applies.

New Build

The site would need to be a minimum of 0.1 hectare, with good access by road and ideally with mains electricity and water connected.

4.4 Site Location

There is a strategic consideration to the mill location which needs to be factored into the decision on site location.

The mill should ideally be sited to simplify the logistics of access and distance of travel. Obviously a site at the southern end of the island would be best to meet these criteria.

If the mill is to function as a tourist attraction there is also the need to look at spread of attractions and development opportunity across the island. For the logistical element of reduced traveling distances for materials and product, a site in the south of the island is favoured. This is also consistent with a tourist offering. A site close to the ferry would be immediately accessible to visitors and could be used as a tourism signpost for the rest of the island.

There is also the consideration of which community on the island would benefit most from the development. With the exception of the pier, Uyeasound has not benefited from as much development as Baltasound and Haroldswick.

A site in Uyeasound would be readily accessible for visitors soon after arrival on the ferry, it could thus be used as a signpost facility as well as attracting visitors interested in seeing the spinning process and yarn production. It would also be advantageous for transport logistics, being close to the ferry and with a reasonable road infrastructure. With this in mind the continuation of the study will focus on the identified site in Uyeasound and a new build in the same area.

4.5 Plant and Equipment

The SOGP proposal was based on plant and equipment from Belfast Mini Mills Ltd which is a Canadian company located on Prince Edward Island and which specialises in small scale yarn spinning and associated processing equipment. The flow process chart is shown in appendix A.

An internet search showed that although there are other suppliers of the various machines required to make up a mill, the Belfast Mini Mill company is the best for supplying a full package of equipment which is designed to be complimentary. The sourcing of the equipment from one supplier also has the advantage of easing the commissioning process as the one supplier is responsible for the integrated plant.

The prices quoted by Belfast include commissioning, and are for an integrated process to create woollen yarns from raw fleeces at a rate of 2.5 kg per hour for four ply standard weight yarn. The quoted prices include an allowance for the specialist spare parts which may be required to service the equipment.

As well as the process equipment, ancillary equipment will be required for dust control and quality control. The cost of these has been included in the capital cost estimates.

4.6 Budget Capital Cost

A full breakdown of the estimated budget capital cost is given in appendix B. The cost is based on the mill being sited on the designated hatchery site in Uyeasound. The cost identified can only be treated as approximate since an accurate definition would require investigative work, conducted by professional consultants, that is beyond the scope of this study.

Equally the scope of the project itself will need to be defined as a result of investigative work and consultation which was excluded from the brief of this feasibility report. Consequently the breakdown is intended to be purely indicative of the capital cost for the project as envisaged at this stage, and to give an indication of the scale of funding which may be required.

As presented the cost would include acquiring the site at Uyeasound along with additional adjacent land, connection of site services, extending the existing building, upgrading the existing building, creating a new visitor building, site infrastructure work (access and parking), water collection and effluent management. Budget costs have also been identified for a professional design and management team to progress the project.

The budget identifies a potential cost of £111,000 to develop the project to capital funding and a capital cost of £788,000 which includes site and land acquisition costs as well as building costs. This gives a total project cost of £899,000 which will require funding.

4.7 Finance and Funding

A funding strategy for the development needs to be prepared based on the capital and development costs identified.

Potential main funders would be SRDP and Big Lottery GCA 2. Both offer grants for capital projects of up to £1M. Both of these would want other funders to be on board and a portfolio of secondary funders would need to be engaged. Secondary funders could include Community Enterprise Scotland as well as private trust funds such as Lankelly Chase, Robertson Trust and Esmee Fairburn. An amalgam of funding partners will be required depending on the final level of funding necessary. All of the funders above are likely to provide both capital funding as well as the revenue funding identified in the cash flow forecast.

Big Lottery Investing in Communities, Growing Community Assets should be considered as a prime potential funder. Notes on the programme are given in Appendix D

There is the possibility that the project could generate some interest from private investors. It is equally possible that some loan funding could be factored into the funding package from banks sympathetic to community enterprise such as Triodos Bank.

There will be an initial requirement for development funding to progress the project before the definitive capital proposal can be made. The Big Lottery GCA programme is geared to provide this funding.

5. Proposed Business

5.1 *The Business Model*

The origins of the business proposal lie in the demand identified by Shetland Organic Producers Group study. This demand constitutes one third of the total capacity of the mill, and approximately 56% of the break even turnover required. To succeed the mill will need to produce both organic and nonorganic yarns.

The simplistic concept of running all the organic production for a year in one run is not practical unless extremely high stocks of either yarn are held. Also the concept is at odds with the identified customers' requirements. If the markets for yarns are to be small batch specialist products the customers will require fast turn round on their orders. They will not want to wait whilst four months of organic production is completed before their order is started. The other factor in determining production planning is the switching of the plant from organic to nonorganic production. In practice this will only involve a deep clean. The certification for organic production will be gained from batch traceability and separation through the manufacturing process more than from cleaning equipment. For the sake of efficiency runs of production should be kept as long as possible on either type, but the scale of production runs can be nearer to one week than several months.

The sales for ShetlandOrganics represent a significant starting point for the business but on their own will not lead to profitability in the short term. It is also disadvantageous in any business to have one customer representing so much of the turnover. The ShetlandOrganics business should be the launching pad for start up, but the emphasis from the sales and marketing strategy should be to grow other niche markets.

The cash flow forecast in Appendix C is based on a first year of manufacturing for ShetlandOrganics and achieving approximately one third of total sales from new markets. Subsequent years are shown with growth rates of 10% per annum for organic and 30% growth in other markets for the first year followed by a rapid expansion to full plant capacity in year three.

The forecast includes sales and overheads for the shop activity (including factory tours) as well as the overhead for operating the shop and tours facility. In fact this activity would be loss making although only part of the administration costs and overhead would be consumed by this activity. The rest would be required for plant operation, so the shop activity could be regarded as a marginal cost which absorbs spare capacity in the running of the whole facility.

5.2 *Market Research*

Within the context of the brief, the budget and the business model, the market research was, of necessity, desk research, internet based and focused on identifying where the sales predicted and the growth rates could be achieved to support the successful business model identified.

The assumption was made that the relationship with ShetlandOrganics would satisfy at least in the first three years the activity in organic wool production. Research was conducted to look at the price

structure and price premium of organic wool against non-organic, but the market size was not pursued since this is irrelevant when the entire market will be in the hands of ShetlandOrganics. The basic research carried out did indicate that there is no apparent price premium established in the market place at this time. The market place at this stage was considered to be the UK.

The other consideration of note is that the market value of yarns in general (including organic) is significantly greater than the prices identified in the SOPG study. This variance is of the order of 200-300%.

The other market segments identified in the brief were examined for price structure volume and marketing strategy. The results are tabulated below: (units kg)

Market Segment	Volume	Price
ShetlandOrganics	1,300	£38.00
Organic Wool	-	£90-£150
Fancy Hand Knit Yarns	250,000	£90-£150
Specialist Rug and Weaving Yarns	50,000	£70-£130
Lace Weight Yarns - Shetland	100	£100-£180
Lace Weight Yarns - UK	950	£100-£180
Reconstructive Yarns	-	£180-£250
Felt and Batts	2,000	£25-£50

5.3 Market Segments and Products

Because of the origins of the project the concept of the mill came before considerations of the market place as a whole. However the plant envisaged is ideally suited to supplying small batch production for specialist yarn markets. These markets determine the marketing strategy and the price, placement, promotion and products for the marketing plan.

ShetlandOrganics CIC

Technically this market could be generically “organic yarns” but effectively in taking on ShetlandOrganics demand, not only is the market for organic wool in Shetland being met, any increase in sales beyond Shetland will require a source of organic fleeces. This creates an initial limit on the volume of this segment unless other suppliers of fleeces can be obtained. The limit short term is 2000 fleeces per annum creating approximately 1,300 kg of yarn. The quoted price of £38 per kilo is low for the market price of wool, ignoring the organic premium which should be expected. An average price of £45 per kilo depending on yarn weight would be more realistic. This should be subject to negotiation should the project proceed, but to save speculative financial figures the cash flow forecast has been based on £38 per kilo. This market segment exists and is integral to the project so far. Only if there is a longer term desire to satisfy other organic sectors will there be a

requirement for promotional activity. The growth of this market segment is difficult to predict. There are optimistic forecasts, and strong indications of growth in established organic sectors. These however are food products and the organic benefits are felt more strongly than in non-comestible items. In any event if the growth of the organic yarn market is strong it would be strategically better to look to absorb the growth through other customers rather than allow the percentage of ShetlandOrganics business rise.

Fancy Hand Knit Yarns

This market segment has the highest sales potential of available markets. The hand knit yarn market in the UK was worth in excess of £25M in 2009, and even at the basic level is premium priced. It is by nature low volume orientated, particularly in the area of specialist fancy yarns. It is a market where “Shetland Wool” has high credence and is an established brand which can be built on. There are two potential ways of serving this market segment; placement with specialist shops, or direct sales through the internet. The latter is the growth area, and the way forward. It also benefits from a higher price structure, and direct cash flow. A sales interactive web site is required, but this is consistent with the requirements for all of the potential market segments. It is easier in this market segment to identify standard products which can be offered. A market penetration of 0.1% in this market would yield sales in excess of £25,000.

Specialist Rug and Weaving Yarns

It proved difficult to find definitive figures for the potential of this market since it covers a wide range of potential segments and a wide variety of yarns and applications. Estimates of the UK market varied between £2M and £8M, but a strong growth rate underpinned the estimates and contributed significantly to the variation. Again specialist yarns demand premium prices, and the placement options are as for the hand knitted yarns except the outlets are more craft orientated. The development of this market would probably best accomplished by small batch commission spinning of yarns for designers or rug and fabric producers. This would create a basis for the development of products to be sold on the open market once familiarity of the needs of the market segment had been identified. Promotion for this type of commission spinning would be advertising in specialist magazines or presence at trade fairs and exhibitions. The product price structure benefits from high production rates and high yields which lower the cost of sales against the premium prices. A first year sales target of £5,000 would be appropriate.

Lace Weight Yarns

This market segment aligns itself with the local lace making of Shetland, and Unst in particular. The segment as such is small but there is a larger demand across the UK. The segment is best developed in the same way as the rug and weaving yarns, by commission production. This product however does not have the advantage of high production rates and yields; in fact production rates will be low as will yield. The price structure will require close control to ensure the level of profit and the gross profit margin is likely to be significantly lower than in the other market segments. Against this the segment demands prices in the region of £130 per kilo.

Reconstruction Fabrics

Although not included in the brief, this market segment was identified for consideration. It is a segment that is relatively new and undeveloped. There is a growing interest from historical and archeological institutions to generate authentic replication of historical fabrics. As such low volume

commission spinning is a requirement, and there is a premium priced market segment supporting it. The size of this segment is difficult to assess in total as it is relatively undeveloped and could be worldwide. However it is small, but could be profitable. Authentic representation of historic fabrics immediately makes it part of the organic production, and ShetlandOrganics also see this as part of their potential market place. A contribution from this segment over and above the ShetlandOrganics business needs to be carefully considered in terms of the mill's business profile.

Felt, Batts, Roving and Waste Products

The plant will be supplied with the capability of producing felt, batts and roving. These products have low manufacturing costs as they are created without the spinning process. Equally their price is low relatively and the profitability is reflected in this lower price even though the production cost is less. As such they should be regarded as potential by products which can be used to absorb spare capacity as and when this exists. The prime products in terms of profitability are spun yarns and manufacture of the byproducts should always take second place. This applies even more so to waste processing. With a virtually zero raw material cost, processing waste in any way has to be questioned, and not allowed to deflect the business effort from the most profitable products. Ecologically sound waste disposal is probably a better option than waste or byproduct processing unless there is a marginal cost justification to establish the benefit of using manufacturing resources to produce byproducts or process waste.

5.4 Sales and Marketing Strategy

Branding

With organic manufacturing certification there are two established brand identities which can be used on appropriate products. These are "Shetland Wool" and "organic"; both have high customer recognition, although the value attributed to the Shetland name for these products is certainly the stronger. The Unst Partnership has an objective to create an Unst brand to the benefit of all products and services originating from Unst. This project is the first step in this longer term development and as such will be used to establish and promote the Unst brand. Products should be promoted under both the Unst and Shetland brand identities and organic where appropriate.

Placement

Internet selling is technically worldwide, but increasingly customers on the internet are becoming more parochial. The trend is with wider choice sources where there is no currency exchange or global delivery implications are favoured. Similarly for a new business it is best to concentrate on supplying local markets before contemplating worldwide coverage. The Shetland market alone is not sufficient to support the business, so the UK market is the first consideration. Internet selling will open worldwide markets but the focus initially should be on the UK. Particularly for commission manufacturing where the difficulties of dealing with problems and creating direct contact are easier.

Promotion

Two sales strategies are identified, internet selling and commission manufacturing. Each requires a separate promotional strategy.

Internet selling requires an interactive sales web site to be constructed. The web site should be designed on the back of key word research in the identified market segment to ensure there is the necessary response from search engines. This is of prime importance as is safe internet transaction. These two, to some extent, take precedence over visual appeal and strong branding.

Commission manufacturing requires direct customer interaction. The best promotion of this business will come from specialist advertising and trade fair or exhibition presence. Allowance in budgets will need to be made to ensure this activity, along with suitable promotional leaflets and materials to support it.

Products

Products for ShetlandOrganics and commission spinning will be customer determined, but a product portfolio needs to be developed to service the hand knitting market segment. This portfolio should be aimed at the high value specialist yarns where “Shetland Wool” and “organic”, when appropriate, will be perceived as beneficial.

Price Structure

ShetlandOrganics and commissioned products will be contractually determined. This is difficult particularly for a new company where there is no manufacturing histories to draw on to accurately determine production costs. The indications are that the level of profitability available will buffer some of the potential inaccuracy of original estimates. There are market indicators and competitors’ prices to draw from. The greatest care will be required for the SOPG contract where profitability must be assured as the contract will be ongoing and represent a significant part of the turnover.

Pricing for products in the hand knit and craft market are not production cost based but are market lead. Once the product portfolio is developed the market prices are easy to determine from basic internet research. Profitability levels are such that there should be plenty of latitude for the lack of production history as a basis for cost of sales.

Competition

This type of manufacturing plant is fairly unique as it occupies a position between true cottage industry and large scale manufacturing. Internet searches and enquiries identified only four potential competitors in the UK. Of these none were offering their own branded products on the market. One was also committed to minimum batch sizes that would not be competitive with the minimum batch sizes of the plant proposed. The others have a distinctly “life style business” feel, which although flexible does not inspire confidence in customers particularly in terms of delivery and completion promises. None of the competitive businesses is able to legitimately identify with a brand as strong as the “Shetland Wool” brand.

5.5 Business Structure

The Unst Partnership is an established organisation, registered as a Company Limited by Guarantee. It is constituted in community representation; as such it can access funding to develop the community and assets for the community. Since the heart of the project is asset development, it already in the position to own the assets, and trade as a business. However

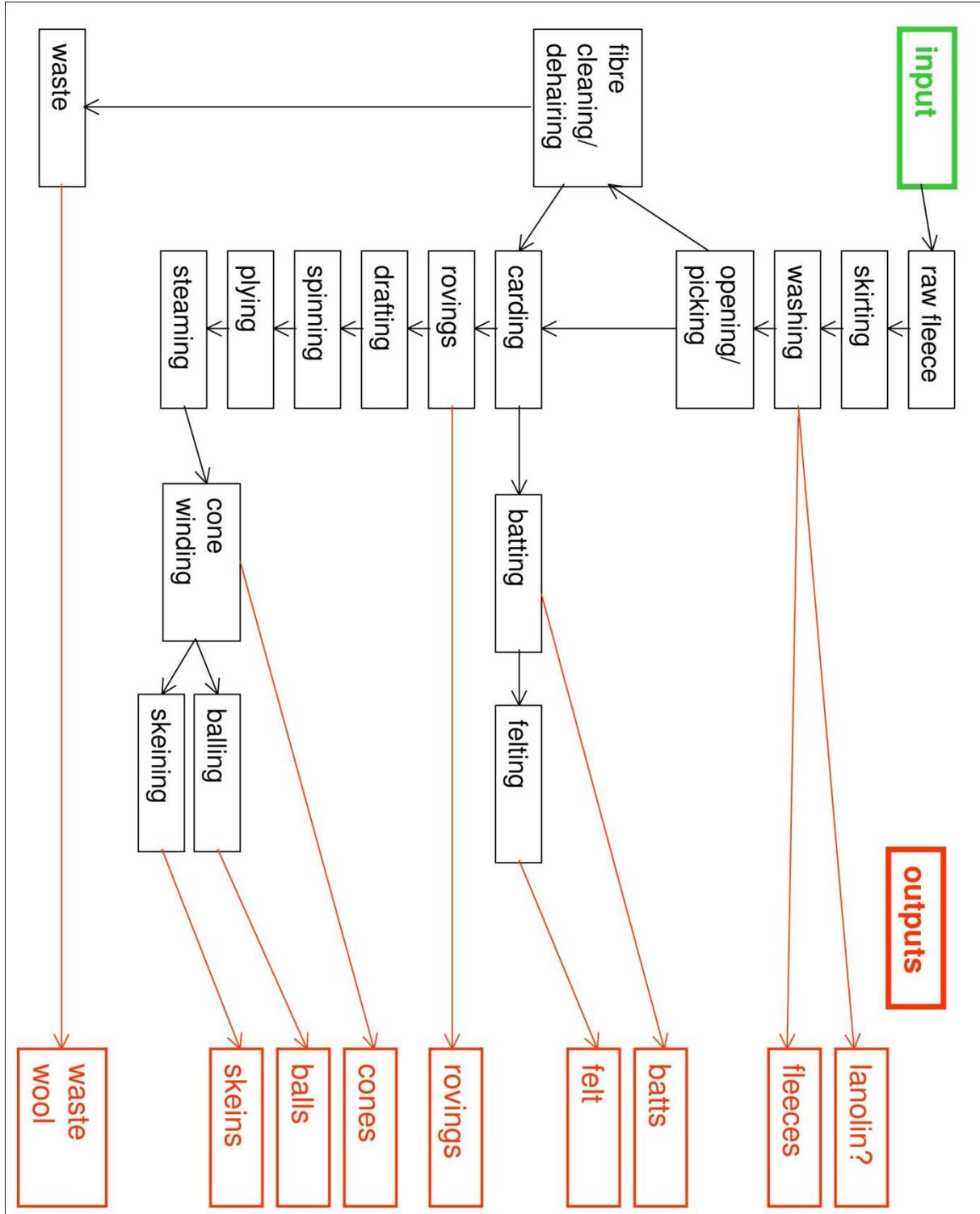
this is not necessarily the best way of proceeding and the Unst Partnership has already identified and evaluated the idea of setting up a wholly owned trading subsidiary.

To protect the asset created the property will be owned by the Unst Partnership and be managed by a newly created wholly owned trading subsidiary. In this structure the trading subsidiary would be a share based Community Interest Company.

If the project is progressed a monitoring and evaluation system will need to be established to create and measure the targets and outcomes over time and report these to the key funders, stakeholders and Board of the Unst Partnership.

Appendix A

Flow Process Chart.



Appendix C

Three Year Cash Flow Analysis

Operating Company - Three Year Cash Flow Forecast			
	Year 1	Year 2	Year 3
Sales Revenue			
Organic Yarn Sales	52,400	58,000	64,000
Other Yarn Sales	36,600	47,500	110,000
Shop Sales	10,000	12,000	12,000
Total Sales	99,000	137,500	186,000
Direct Costs			
Materials	1,600	1,900	3,200
Labour	22,600	33,900	45,200
Packing and delivery	4,500	6,800	9,000
Total Direct Costs	28,700	41,000	47,000
Gross Profit	70,300	96,500	139,000
Overhead			
Wages and Salaries	20,000	21,000	22,000
Insurance	8,000	8,000	8,000
Administration Costs	1,800	2,000	2,200
Professional Fees	10,000	6,000	4,000
Maintenance	3,400	3,500	4,600
Cleaning	6,000	6,000	6,000
Business Rates	4,500	8,000	8,000
Energy	12,500	13,500	15,500
Services	6,000	8,000	9,000
Telephone	1,200	1,200	1,200
Advertising	8,000	4,500	4,500
Total Overhead	81,400	81,700	85,000
Net profit	-11,100	14,800	54,000
Revenue Funding / Loans	15,000	-	-
Cash Reserve	3,900	18,700	72,700

Appendix D

Big Lottery – Investing in Communities Programme

June 2010 to June 2015

As in the previous programme the funding will cover three investment areas;

- Supporting 21st Century Life
- Life Transitions
- Growing Community Assets

and offers grants from £10,000 to £1,000,000.

There are outcomes to be achieved in each of these areas and funded projects will need to show they will help to achieve the changes required to deliver the outcomes as a result of Big Lottery funding.

Equalities, Environment and Empowerment

Big Lottery is making the above factors integral to their funding programme.

“In order to bring about lasting change, equalities, environment and empowerment must be at the heart of the projects we support. We believe they are connected and that communities and organisations that take them to heart will be stronger and achieve better outcomes in the long term.”

Applicants will be required, at the early stages, to show they have considered these factors in the design and delivery of their project.

These factors were included in the previous programme, but were secondary to the main outcomes; the increased emphasis being shown will require higher emphasis of proof and greater consideration to these factors than before.

Growing Community Assets

This area of funding is primarily about giving communities *“more control and influence over their own future through ownership of assets”*.

The declared aim is to make communities stronger by helping them to acquire, manage and develop assets, providing quality services and amenities that generate income streams.

The development of assets should improve the social, environmental and economic future of the community.

The fund will focus strongly on meeting need. Applicants will be required to show how needs have been identified through consultation with people in the community.

They will be required to show how the project is the best approach to meeting the needs.

Outcomes

Big Lottery wants to see four outcomes; all these outcomes must be met by the project.

- Communities work together to own and develop local assets
- Communities are sustainable and improve their economic, environmental and social future through the ownership and development of local assets.
- Communities develop skills and knowledge through the ownership and development of local assets.
- Communities overcome disadvantage and inequality through the ownership and development of local assets.

Qualification

Voluntary and community organisations may apply as long as;

1. They have a written governing document (constitution, set of rules, trust deed, memorandum and articles of association)
2. They have at least three unrelated people on the governing body, management committee or board.
3. They have a bank or building society account in the name of the organisation which requires two unrelated signatories to make withdrawals.
4. They must be able to submit an approved set of signed and dated annual accounts no more than 12 months old. (New organisations require signed and dated income and expenditure estimates for first 12 months)

5. They must be community led and controlled and open to all members of the community. The majority of the management committee or board must be community members elected by the community.
6. The community itself must be defined in terms of an identifiable local geographical area (postcode(s) or recognised parish or district boundary). Membership must be at least 10% of the community or 100 whichever is the lesser.
7. Profit making organisations (CIC) can be funded with certain restrictions on profit.

Qualifiers 5, 6 and 7 will require changes in constitution if it does not already comply.

Application Process

The application process is in two stages, as before, but with case officers becoming involved much earlier. Applicants are invited to make first contact by 'phone rather than submitting an outline proposal form, thus creating an initial application screening on an informal basis. It has the advantage that ideas may be proposed without an excessive resource commitment.

General Comments

The second phase of GCA seems to be building on the experience of phase one. Big Lottery are supplying support direct and making the initial application possible without committing high levels of resource to develop the idea.

The major changes are in the focus on meeting the needs of the community as a starting point, (this crept into later applications in phase one, but at least now it's upfront) and the emphasis on dealing with inequality and disadvantage.

This puts the requirement for community consultation up front, almost on a basis of "let's get the community together and see what it needs" as a starting point. This seldom happens, as most ideas are generated individually and are propagated by small groups of motivated people. To satisfy Big Lottery in these circumstances, a project would need to show that it has been floated to the community at large and other ideas listened to and evaluated to prove that the proposal is accepted as the best. There is a requirement to explore all alternatives very early in the project.

Community representation and consultation are important as is identifying and meeting *real* needs.