ENHANCING DECISION MAKING CAPABILITIES FOR RIVERLAND GROWERS - KNOW YOUR NUMBERS KNOW YOUR RISKS



FINAL REPORT to **GRAPE AND WINE RESEARCH & DEVELOPMENT CORPORATION**

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1. Abstract

The following abstract summarises the project objectives, method and outcomes:

A new web-based program, *Know Your Numbers, Know Your Risks* (KY#), was developed and launched to Riverland growers on the *Riverland Wine* internet portal. This program supersedes other tools available to the sector, to benchmark vineyard inputs and costs, and assess economic viability of businesses. The program supports growers' decisions on profitability for their whole farm, varieties and individual patches using a simple input process of readily available information. It delivers a meaningful, true net farm profit or loss figure, not distorted by cash flow or tax considerations, and contains costs and income matched to a specific crop year.

2. Executive Summary

A summary of the project's outcomes and benefits, a guide to the practical implications of the project, and benefits it may provide to the industry, and any future research or communications are described below:

A new web-based program, *Know Your Numbers, Know Your Risks* (KY#), was developed and launched to Riverland growers on the *Riverland Wine* internet portal. The program was supported through grower group tutorial sessions, a detailed manual and online tool tips. 30 growers have undertaken the tutorials to date, with growing interest from others as benefits are communicated within the industry.

The project was conceived in Riverland grower workshops held in 2005 when grower returns were diminishing. Drought conditions had started to affect the Riverland region but the full impact of water restrictions and poor commodity prices were yet to fully impact on the industry. The absence of reliable cost of growing information and restricted access to benchmarking data continued to impede the best efforts of all industry stakeholders to build sustainable enterprises at every level.

The KY# program, developed and improved with industry feedback though the group tutorial sessions, supports growers' decisions on profitability for their whole farm, varieties and individual patches using a simple input process of readily available information. It delivers a meaningful, true net farm profit or loss figure, not distorted by cash flow or tax considerations, and contains costs and income matched to a specific crop year. This program supersedes other tools available to the sector, to benchmark vineyard inputs and costs, and assess economic viability of businesses. The program is accessible to wine growers on the Riverland Wine's website at www.riverlandwine.com.au

This project, which commenced in 2008 and finalised in 2013, acknowledges financial support from PIRSA/DTED, Riverland Wine and GWRDC.

Partnerships in the project are also acknowledged, and have included: Pauline Diano, PIRSA-appointed Project Manager; Jamie Ball, Agricultural Consultant Jamestown SA; Glen Ronan, Economist PIRSA; David Pocock, almond producer and former Horticultural Consultant, Rural Solutions SA; and Katalyst Interactive, web developers and programmers.

3. Background

The following background summarises the background in the original applications (GWRDC Projects RD 07/05-1 and GRP1101) and includes other relevant material:

The project was conceived in Riverland grower workshops held in 2005 when grower returns were diminishing. Drought conditions had started to affect the Riverland region but the full impact of water restrictions and poor commodity prices were yet to fully impact on the industry.

In 2005, Riverland growers and Rural Solutions SA (PIRSA) worked together to determine the (standard) cost of growing one tonne of grapes. The exercise revealed the majority of growers did not have:

- sufficient information readily available to enable them to contribute real data to the process,
- income and expenditure information organised in such a way as to enable them to regularly assess financial risk,
- the competence necessary to assemble financial information into formats that would provide useful management data,
- the ability to evaluate their enterprise, relative to others, within and outside the region.

It was made obvious that without solid financial data to support arguments:

- growers were not in a position to represent their sector adequately in industry debates over commercial issues,
- growers were at a disadvantage when making representation to government and to industry agencies,
- excessive risk would continue to be passed to growers at the lowest level in the supply chain thereby undermining the foundation stones of the industry.

The absence of this (reliable) cost of growing information and restricted access to benchmarking data continued to impede the best efforts of all industry stakeholders to build sustainable enterprises at every level.

Riverland wine grape growers recognised the need to clearly understand their costs of production and gross margin to improve long term sustainability and improve profits. Unfortunately, traditional methods of Gross Margin Analysis fall short of delivering the true cost of production (including overheads).

A program was needed to assess the impact of a number of partial budgeting scenarios on a specific farm to assess the impact of increased (or reduced) irrigation or other inputs and what impact that may have on yield or price to ensure the property has maximised return for inputs. Many growers lacked an easy way to accomplish this with any degree of reliability, and hence were unable to assess the potential risk options.

The proposed KY# program would not be dissimilar to a number of existing programmes designed to enable primary producers to calculate gross margins and a range of other financial ratios and reports that indicate the profitability or otherwise of farm enterprises. For example Grow-Data, Vine-Biz and Seasons of Change are several programs that were available and used by a small number of growers. The drawback to all of these other products is that they were stand-alone, desktop tools that growers must acquire, load and maintain. The stark difference with the proposed Know Your Numbers (KY#)

tool was that it would be web based with a *dashboard* to guide growers through the process of setting up a business entity, creating a property or properties and then guiding growers through the process of data entry (income, expenditure, water consumption) and report generation.

In addition, the retention rate among the users of the other products listed above was not good. Many growers had investigated these programs, and some had invested in them, but very few have become long term users. The reasons given for low retention rates had partly been about initial cost and lack of guidance once the programme has been installed. The proposed KY# program's inbuilt tool tips would make the product more user-friendly, and by encouraging growers to form into user groups or tutorial groups, it was anticipated that greater initial uptake and retention would occur. The fact that the proposed KY# program would be web based, also added the potential to capture data sets and develop reliable regional averages for some of the key criteria (such as tonnes per hectare by variety, water consumption per hectare by variety, average gross margin per hectare).

The proposed KY# program also needed to enable participants with limited computer skills to easily put in the necessary data and generate a series of basic reports and graphs on whole farm, variety and patch performance. Such a program would be suited for delivery primarily by the internet (such as from the Riverland Wine website), which would offer growers the ability to work in their own time, using a simple entry method while maintaining control of their records and confidentiality, which are all key elements for their participation.

Hence, the Riverland Winegrape Growers Association (RWGA) approached Primary Industries and Resources SA (PIRSA) through the Grape & Wine group and produced the Future Options paper that highlighted the benefits that result if a standard cost of growing application can be developed and made available to all Riverland winegrape growers and supported through their industry association – namely the RWGA.

In 2007, the Department of Primary Industries and Resources SA (PIRSA) and the Department of Trade and Economic Development (DTED) funded a Project Manager to scope, plan and implement the Know Your Numbers, Know Your Risks program, which included benchmarking, the RWGA internet website and the Growers Intranet Portal. GWRDC approved the application and funded the project for the period June 2008 to January 2010 under the GWRDC Project RD 07/05-1. A further GWRDC project agreement GRP1101 was approved in 2011-12 to enable completion of the KY# program's online integration and grower extension workshops, with a project agreement variation on 29 June 2012 and subsequent revisions. The project delivery was finalised in July 2013.

Summary of Project Aims or Outputs

A summary of the project aims or outputs as described in the original application, incorporating any approved modifications is given below:

Growers need to be able to access management information more efficiently to enable them to monitor their costs and assess the ongoing risks to their business and forecast returns on a regular basis. They cannot manage what they do not measure.

The KY# program would enable growers to have current and accurate data about their business, in exchange for basic inputs and minimal cost. It will provide:

- increased information to growers
- increased grower knowledge
- improved decision making regarding issues of their business
- industry sustainability with accurate cost of growing data for different enterprises in the region.

Growers will be able to determine their financial status quickly either by themselves or with the help of their accountant/banker. This will give individual growers the requirements and the facts for further decision making and planning.

This project aims to produce a new web-based program, 'Know Your Numbers, Know Your Risks' (KY#) to be developed and launched to growers, and supersede other tools available to the sector.

4. Project Aims and Performance Targets

In the tables below are a description of the planned outputs and performance targets as they appeared in the original application, or as otherwise approved, with any changes to the original targets highlighted.

Outputs and Performance Targets 2007-08

Outputs	Performance Targets	Target Date	Achieved Date
1. Application for funding from FarmBis	Funding for education and extension is granted	8 May 2008	*refer 6. Results*
2. Consultation with industry bodies is conducted	CCW and Rural Solutions have accepted the proposal of their role with in the project	22 May 2008	22 May 2008
3. Project scoping with consultants is coordinated	Consultants have scoped and signed off on the specifications of the project and their roles	2 June 2008	2 June 2008
4. AHA Viticulture are engaged for the project	Letter of engagement with AHA Viticulture has been accepted	18 June 2008	18 June 2008 *refer 6. Results*

Outputs and Performance Targets 2008-09

Outputs	Performance Targets	Target Date	Achieved Date
1. Grower consultation / Information program	Growers are consulted through the website, email, short messaging service and direct mail	ongoing	ongoing
2. Project Management documentation	Project Charter is completed and has a Scope, Budget, Schedule and Risk & Communication Plans.	12 August 2008	12 August 2008
3. Adaptation of the VineSite application	VineSite application is completely adapted to Riverland and ready for integration to the website	9 Oct 2009	Not applicable *refer 6. Results*
4. Web developers are engaged for the project	Letter of engagement with Digital Monkey has been accepted	4 Nov 2008	4 Nov 2008 *refer 6. Results*
5. Integration of application to website	Cost of growing application KY# is fully integrated within the RWGA website portal	2 March 2009	31 Aug 2011 *refer 6. Results*
6. Development of Data repository for Benchmarking	Database has been developed and integrated with the application and the website	2 March 2009	31 Aug 2011 *refer 6. Results*

Outputs and Performance Targets 2009-10 (2012-13)

Outputs	Performance Targets	Target Date	Revised Date	Achieved Date
1. ~~VineSite~~ KY# application integrated within RWGA Intranet portal	Application has been launched and is being used by growers	1 July 2009	31 Aug 2011	15 June 2012 *refer 6. Results*
2. Development and delivery of extension programs	Familiarisation and extension program has been implemented.	21 Aug 2009	30 Sept 2011	31 Aug 2012
3. Grower extension workshops are developed and implemented	Ongoing extension for growers is designed and delivered	Ongoing	30 Oct 2011	31 July 2013

Special Conditions

Outputs	Performance Targets	Target Date	Achieved Date
Production of Brief Business plan *(refer GRP1101 Project Agreement variation)*	a. A strategy to promote the adoption of the "~~VineSite~~ KY# cost of growing application" (~~VineSite~~ KY# by Riverland grapegrowers), including a consideration of the number of growers and the size of the subscription necessary to independently support the ongoing hosting, maintenance and further development of the ~~VineSite~~ KY#, and b. A strategy to broaden the scope of ~~VineSite~~ KY# to permit its access and use by other regions, following the completion of the Project.	Not specified	*refer 6. Results*

GWRDC approved variations to the Project Agreement for this project:

This GWRDC project was conducted under two agreements (RD 07/05-1 and GRP1101) and delivered from 2007 to 2014, with significant preliminary work occurring prior to 2007 (*refer 3. Background*). Project variations extending due dates were approved on 29 June 2012 (to carry out tutorials/workshops I 2012-13) and 15 April 2013 (for Final Report), with updates provided to GWRDC.

Significant delays to the project occurred following the early departure of the PIRSA-appointed Project Manager in 2010, and the Riverland Winegrape Growers' Association (RWGA) had no alternative resource to carry on the work.

By the time the project was revised the *Ruby on Rails* framework used to build the site required substantial upgrade from version 2.3.11 to version 3.2.8.

The integration of the Riverland's two regional organisations and resultant reduction in human resources also impacted on delivery capacity. Riverland Wine emerged from that transition period with improved capacity to deliver this and other services for grower and winery stakeholders via outsourced service providers, such as Rural Solutions SA to deliver the KY# workshops and tutorials.

A minor delay occurred in early 2013, due to illness of the RWGA (now Riverland Wine) Project Manager.

5. Method

The following methodology describes the nature of the Project and how it was carried out.

2007-08

Item	Method
1. Funding from FarmBis	A funding application was prepared and submitted to Farmbis.
2. Consultation with industry bodies	Industry bodies, CCW and Rural Solutions SA were consulted on their role within the project and a proposal developed.
3. Project scoping with consultants	The Project scoping was coordinated with consultants.
4. AHA Viticulture project engagement	A Letter of engagement with AHA Viticulture was developed.

2008-09

Item	Method
1. Grower consultation / Information program	A grower consultation and information program was developed and implemented.
2. Project Management documentation	The Project Management documentation including the Project Charter, with Scope, Budget, Schedule and Risk & Communication and Reporting Plans were developed.
3. Adaptation of the Vinesite application	The Vinesite application was adapted to the Riverland and made ready for integration to the website.
4. Web developers are engaged for the project	A Letter of engagement with Digital Monkey was prepared for approval.
5. Integration of application to website	The cost of growing - Know Your Numbers (KY#) application was prepared for integration within the RWGA (Riverland Wine) website (portal).
6. Development of Data repository for Benchmarking	A Database (for repository of benchmarking data) was developed for integration with the KY# application and website

2009-10 (variation 2012-13)

Item	Method
1. Integration of ~~VineSite~~ KY#application within RWGA Intranet portal	The ~~VineSite~~ KY# application was prepared for integration within RWGA (Riverland Wine) Intranet portal, and launched.
2. Development and delivery of extension programs	The KY# application familiarisation and extension program was developed for implementation. Rural Solutions SA was contracted to develop and deliver 3 KY# tutorials from expressions of interest received, then provide 2 additional support tutorials to current participants to ensure effective adoption of the KY# program. They were also contracted to provide advice on the continued development of the KY# concept and program.
3. Development and implementation of Grower extension workshops	Ongoing extension for growers through Grower extension KY# workshops were designed for delivery.

Special Conditions

Item	Method
Production of brief Business plan *(refer GRP1101 Project Agreement variation 2012-13)*	The production of a brief Business Plan, was an extra item added as a special condition with an unspecified target date, to the GRP1101 Project Agreement variation 2012-13. Note that the KY# program (and not VineSite) was used for this project. At this stage in the KY# program development, there are not enough grower user numbers to complete the Business Plan. Refer *6. Results / Discussion - Special Conditions* table for more detail.

Departures from the method outlined in the original application, what it was and why it was necessary, are described below:

Web Developers

Riverland Wine worked with Katalyst Interactive to improve the KY# application's input formats and output reports. Katalyst Interactive replaced Digital Monkey as the web developers.

VineSite

AHA Viticulture's VineSite program was found to be unsuitable (after consultation) and not used fro this project (*refer 6. Results*). Hence, the KY# program was developed and tailored to the project requirements and outputs.

Business Plan

Refer *Special Conditions* table above, and *6. Results / Discussion - Special Conditions* table for more detail .

New methodologies that may benefit other related or unrelated research included:

Development of KY# User's Manual and Template

The former Rural Solutions SA consultant who was engaged to deliver the KY# workshops, Mr David Pocock was also engaged to develop the KY# application User's Manual (quick reference to improve understanding) in February 2013, and develop a template for distribution in advance to enterprises who would attend workshops. The purpose of these templates was to ensure that workshop attendees brought all of the required information and data to enable them to create KY# records with minimal need for rework. Feedback from the growers who participated in the KY# tutorial sessions, also indicated a preference to have ready access to a user manual, even though there the program itself has comprehensive online *Help* assistance Final adjustments to the program and the manual were concluded by 14 July 2013. The manual and template were not specified in the contract, but Riverland Wine has continued to work with Katalyst Interactive and David Pocock to develop a Depreciation Calculator, in addition to the online Help Manual which can also be produced as a hard copy.

Ongoing Extension of the KY# Program

Riverland Wine has been working with the region's major wine groups (Yalumba, Angoves, Kingston Estates, Salena Estates and CCW) to identify the grower enterprises most likely to utilise the program. Riverland Wine will also demonstrate the product to financial institutions. This was previously done earlier in the project to acquaint the banking sector with the KY# program. Early experience in this project revealed that larger, better organised enterprises were more likely to utilise the KY# program. The KY# program was also promoted via the weekly Riverland Wine electronic newsletter and also in the three weekly Riverland regional newspaper columns (refer Appendix 5).

6. Results/Discussion

The following results detail each logical component of the Project with discussion and impact, and any departure from the method outlined in the original application. Refer also to outputs of relevant documents in Appendix 5.

2007-08

Item	Results / Discussion
1. Funding from FarmBis	A funding application was prepared and submitted to Farmbis, however funding for education and extension was not granted.
2. Consultation with industry bodies	Industry bodies, CCW and Rural Solutions SA were consulted on their role with in the project and a proposal developed. Rural Solutions SA accepted the proposal of their role within the project. CCW were consulted but did not play a role. Workshop delivery was conducted by David Pocock, (former Rural Solutions SA consultant), who is also a large scale almond producer with significant experience developing and delivering desktop cost of production programs for PIRSA and the Almond Board of Australia. From his previous work, he also had experience writing manuals on behalf of other grower groups with similar business tools.
3. Project scoping with consultants	The Project scoping was coordinated with consultants. Consultants scoped and signed off on the specifications of the project and their roles. Consultants Jamie Ball, Agricultural consultant from Jamestown SA and Glen Ronan, Economist from PIRSA provided advice on financial information used by growers.
4. AHA Viticulture project engagement	AHA Viticulture, WA, were invited to visit and comment on the suitability of their Vinesite program for this project. Vinesite benchmarking software had been developed in 2005 by Albert Haak, AHA Viticulture under the GWRDC Project AHA 05/01. After consultation however, no Letter of Engagement was made with AHA Viticulture, due to Vinesite's lack of compatibility to the KY# requirements (too advanced), and being a stand-alone and not web-based product.

2008-09

Item	Results / Discussion
1. Grower consultation / Information program	The grower consultation information program developed and implemented included growers who were consulted through the website, email, short messaging service and direct mail. From these communications, with growers committing to the KY# program. Presentations were also made to banks and financial institutions and financial consultants.
2. Project Management documentation	Ms Pauline Diano, the PIRSA-appointed and funded Project Manager, developed the Project Management documentation including the Project Charter, with Scope, Budget, Schedule and Risk & Communication and Reporting Plans. Ms Diano departed unexpectedly early in the project in September 2009.
3. Adaptation of the VineSite application	Since the AHA Viticulture's VineSite program was unsuitable (refer previous table Item 4.), the VineSite application was not adapted to the Riverland and not made ready for integration to the Riverland Wine website. A new tailored KY# program was developed.
4. Web developers are engaged for the project	The Letter of engagement with the web developers Digital Monkey was prepared and accepted. This was later taken over by Katalyst Interactive.
5. Integration of application to website	The Cost of growing application *Know Your Numbers* (KY#) was integrated within the RWGA (Riverland Wine) website (portal), however not made available until further testing (refer next table Item 1.)
6. Development of Data repository for Benchmarking	The Benchmarking Database repository was developed and integrated with the KY# application and the website, however not made available until further testing (refer next table Item 1.)

2009-10 (variation 2012-14)

Item	Results / Discussion
1. Integration of ~~VineSite~~ KY#application within RWGA Intranet portal	The KY# (not VineSite) application was integrated within the RWGA (Riverland Wine) Intranet portal (with testing and feedback provided in next Item 2) and signed off for launch. It was launched on 15 June 2012 and used by growers. In November of 2012, web developers *Katalyst Interactive* advised that all of the issues or concerns about functionality could be addressed, but that the sight was built using the old *Ruby on Rails* framework (version 2.3.11). The current version (at the time) was 3.2.8, and version 4 was due for release in early 2013. *Katalyst Interactive* recommended an upgrade to the current version be made prior to making the adjustment. Riverland Wine agreed and authorised the work to commence in December 2012 and was completed by April 2013.
2. Development and delivery of extension programs	The KY# application familiarisation and extension program was developed and implemented. The KY# program was developed to support growers in their decisions on profitability of their whole farm, varieties and individual patches, and focuses on a simple input process of readily available information within accepted farm profitability conventions to deliver a meaningful farm profit (or loss) figure. The KY# program was designed to deliver true net farm profit (or loss), not distorted by cash flow or tax considerations and contains the costs and income that relate to a specific crop year. The introductory sessions, tutorials and workshops were held to support the participants in a group setting and a manual (as off line support) could be accessed online. The first round of workshops were convened and completed in August and September 2012 at which 25 growers were introduced to the program. The sessions were conducted by David Pocock (former *Rural Solutions SA*) and Chris Byrne (*Riverland Wine*). At these first sessions, growers were required them to read some detail about the KY# program and to prepare their computer (which took about 30 minutes). Growers supplied information and data from their own wine grape enterprises to set-up property details and used actual financial data to create their own records. The sessions were interactive and conducted in a classroom style with each grower having his or her own computer directly accessing the program online, which provided great insight from a user's perspective in relation to functionality. A comprehensive list of comments, criticism and suggestions for improvement were developed. Details of this feedback were documented and web developers *Katalyst Interactive* were invited to advise how to best address the issues arising. Based on this feedback about the system design and flexibility, a number of program enhancements were recommended. *Katalyst Interactive* revised the KY# program to reflect this feedback. Further workshops were convened in February and May 2013 to enable those growers with some knowledge of the system to provide a beta-testing capability and further revisions, particularly changes to the reporting features of the KY# application that were undertaken.

Item	Results / Discussion
3. Development and implementation of Grower extension workshops	Ongoing extension workshops for growers on the KY# application were designed and delivered, with tutorials offered in groups of 6-8 according to demand. The third round of KY# workshop tutorials was convened in July 2013. In all, Riverland Wine provided tutorials to more than 30 growers over the 18 months to June 2014. To date, there has been no cost to growers. Feedback from users has consistently indicated the KYN program is easy to use and serves the primary purpose of improving their understanding of Gross Margin and the key driver of profit, with many growers now understanding the significance of Gross Margins for the first time. The KY# program users have commonly expressed surprise that they did not realise their growing costs were so far in excess of their gross income. Growers have also reported receiving program output benefits they were not anticipating, such as: • ML of irrigation water used per hectare of production, or • ML of irrigation water used per tonne of winegrapes; as well as • the cost of that water for their situation.

Special Conditions

Item	Results / Discussion
Production of brief Business plan *(refer GRP1101 Project Agreement variation 2012-13)*	The production of a brief Business Plan, was an extra item added as a special condition with an unspecified target date, to the GRP1101 Project Agreement variation 2012-13. Note that the KY# program (and not VineSite) was used for this project. At this stage in the KY# program development, there were not enough grower user numbers to complete the Business Plan. There has however been an ongoing promotion for adoption throughout the project, and as user numbers increase, a better estimate of the number of growers and the size of the subscription necessary to independently support the ongoing hosting, maintenance and further development of KY# can be assessed. The online KY# program has already been broadened to permit its access and use by other regions, with growers being able to enter their regional GI within the program.

7. Outcome/Conclusion

Performance against planned outputs and performance targets

This KY# project achieved the objectives set out in the original and subsequent application (refer *4. Methodology* and *6. Results / Discussion*), despite delays and variations, culminating in the successful launch and implementation of the KY# program, with adjustments as described.

Benefits

The "Know Your Numbers" (KY#) approach has developed into an easy to use, self sufficient method of growers assessing costs and true margins including overheads for each patch or variety of grapes they produce. This has enabled growers to assess the impact of changes in practices on their property with its unique set of resources, business structure and management. The KY# program was designed to train, support and enable growers to operate and analyse data for their property to understand the costs, margins and risks that are unique to their business.

The project delivered the ability for growers to evaluate their costs of the wine grape production by patch, and supported participants to gain familiarity and competence in the operation of the KY# internet based program.

The outcomes provided growers with improved understanding of individual drivers of profit in the industry from a profitability approach. It has the potential to deliver benchmarks for yields, cost of production and water use efficiency to improve competitiveness and productivity.

Practical Implications

The KY# project has identified industry wide profit drivers to be used as the basis for future profitability in the Riverland (and Australian) grape and wine industry. The program is adaptable, with any wine grape grower able to log on to the Riverland Wine website, identify their GI region and enter their data.

8. Recommendations

Future Research Directions and Priorities Arising

This KY# program has now been applied successfully to wine growers in the Riverland of SA. Expansion to other areas and crops are possible.

Riverland Wine will continue to encourage more growers to use this tool as part of their enterprise management and business planning. Riverland Wine have offered growers in the region the opportunity to set up user groups and to encourage benchmarking between producers of similar scale (small, medium, large etc), given that larger enterprises are more likely to utilise the KY# program. They will work closely with wineries to identify a number of small, medium and larger growers to participate in the next round of workshops.

Riverland Wine anticipate that the KY# tutorial groups which have been set up, will meet from time to time to increase their competencies. It is anticipated a charge, perhaps as much as $300 per year per user will also be introduced to communicate the need for commitment (this has worked well amongst Riverland almond growers who have taken part in their industry's own financial program tutorials).

The Riverland grower KY# tutorial groups have also been encouraged to relax some of their confidentiality tensions and focus on measuring performance and making management decisions. In comparison, a number of the most successful almond growers in the Riverland region have been using a similar desktop tool to the winegrape KY# program (under the guidance of David Pocock), in tutorial groups for a number of years. It is no coincidence that these are the better growers, not just because they are better equipped to manage their risks, but they also freely compare notes and performance on a regular basis. Riverland Wine is confident it can establish several such groups of Riverland wine grape growers.

The KY# program has the capacity to aggregate data on a regional basis, and with continued fostering of participation and use, will be a source of useful or perhaps regional benchmarking within several years of its introduction.

Appendix 1. Communication

Outline of How the Outcomes have been Communicated

Riverland Wine convened initial familiarisation workshops across the Riverland and, in response to demand, set up several tutorial groups similar to what is already being done with great success among almond growers. The measure of success was the degree to which growers began using the information derived from using the tool, to make decisions about particular patches of underperforming winegrapes.

Several series of Grower (Breakfast) meetings were held in the 5 key Riverland towns to promote the KY# product, the workshops and the tutorial groups, from which positive expressions of interest occurred. The meetings were held over the 2 year period from 2013-14.

The KY# program was installed on the Riverland Wine website, and promoted at meetings, in media radio and newspaper columns and emailed newsletters.

Presentations were made to banks and other financial institutions and financial consultants in the early stages of the project.

Refer Appendix 5 for list of communications.

Appendix 2. Intellectual Property

Intellectual Property and/or Valuable Information arising from the research

This is a not for profit project. If and when growers are paying for the service, the charge will be to cover costs only. All Intellectual Property generated by this project will be jointly owned by the RWGA and AGWA. There is no immediate plan for either party to commercialise the outcomes of this project.

Appendix 3. References

- GWRDC (2005) Previous work on benchmarking conducted by AHA Viticulture / GWRDC.
- WGGA (2006) VineBiz capacity building project undertaken by Wine Grape Growers Australia
- PIRSA (2006) Benchmarking study of existing benchmarking applications with VineSite being identified as the preferred model, Glen Ronan, PIRSA.
- RWGA (May 2006) "Future Options" for Riverland Wine-grape Growers. Report prepared by RWGA and PIRSA.
- Rural Solutions SA (2005) Reports based on consultation workshops with growers.
- WGGA (2008) Vine Biz Vineyard Business Development Program – a desktop spreadsheet tool developed by WGGA and Schofield Robinson and Associates.
- PIRSA (2005) A Report on the Impact of Current Grape-Pricing Trends on the Riverland Region. Primary Industries and Resources South Australia (PIRSA). Draft Discussion Paper for Public Discussion. April 2005. Web: http://www.pir.sa.gov.au/__data/assets/pdf_file/0007/33568/riverland_wine_price_impact_assessment.pdf
- PIRSA (2005) Almond Economic Model, David R Pocock.
- GWRDC (2005) Development of Benchmarking Software, VineSite Performance Analysis, GWRDC Final Report Project Number AHA 05/01, Albert Haak, AHA Viticulture 20 October 2005.
- PIRSA (April 2005) Economic impact assessment of winegrapes and citrus.

Appendix 4. Staff

Staff engaged on the project included:

Chris Byrne, Executive Officer, Riverland Wine (Riverland Wine Industry Development Council) Loxton SA

Kate Kroemer, Administration, Riverland Wine, Loxton SA

David Pocock, Larila Pty Ltd, Loxton SA (formerly Rural Solutions SA – PIRSA)

Jason Sidoryn, Katalyst Web Design, Adelaide SA

Jamie Ball, Agricultural Consultant Jamestown SA

Pauline Diano, PIRSA-appointed former Project Manager to KY# project, Adelaide SA.

Appendix 5. Other Relevant Material

Appendix 5a (refer attached)

- Knowing the Numbers – Growing the Numbers, Riverland Wine E-flyer article at: http://www.riverlandwine.com.au/media-news/news-media-releases/124-knowing-the-numbers-growing-the-numbers.html

Appendix 5b (refer attached)

- Know our Numbers, Powerpoint presentation to Riverland Growers Breakfast meetings by Chris Byrne, Riverland Wine, 2013.

Appendix 5c (refer attached)

- Know Your Numbers Checklist (May 2014) by David Pocock, 1pp

Appendix 5d (refer attached)

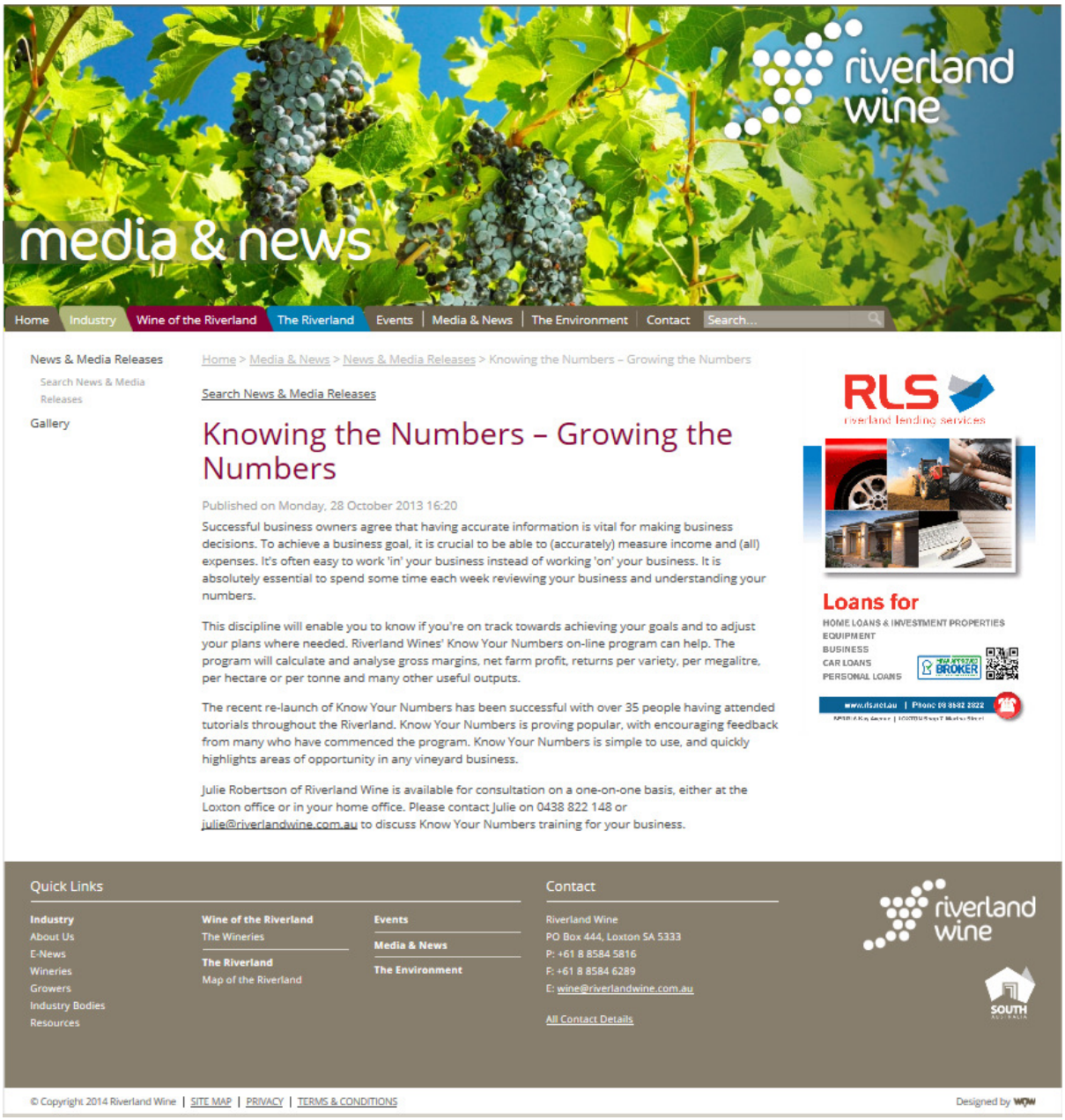
- Know Your Numbers - Users Manual (May 2014), by David R Pocock, 27pp. http://kyn-v2.katalyst.com.au/media/W1siZiIsIjIwMTQvMDUvMDgvMDRfMjNfMjlfNDA1X0tZX01hbnVhbFY5LnBkZiJdXQ/KY%23ManualV9.pdf

Appendix 5e - Other Outputs (not attached)

- Know Your Numbers (KY#) Program (2013) by Katalyst Web Design at http://kyn-v2.katalyst.com.au/
- Know Your Numbers. Article about the program on Riverland Wine Website at http://www.riverlandwine.com.au/industry/winery-and-winegrape-grower-resources/business-tools/know-your-numbers.html
- Knowing the Numbers – Growing the Numbers, Murray Pioneer Newspaper article 28/10/13
- Grower Feedback, Murray Pioneer Newspaper article 16/5/14
- Grower Feedback, Riverland Wine E-flyer article at: http://www.riverlandwine.com.au/media-news/news-media-releases/220-grower-feedback.html
- Know our Numbers, Powerpoint presentation to CCW by Julie Robertson, Riverland Wine, 2013

Appendix 5a

- Knowing the Numbers – Growing the Numbers, Riverland Wine E-flyer article at: http://www.riverlandwine.com.au/media-news/news-media-releases/124-knowing-the-numbers-growing-the-numbers.html



Appendix 5b

- Know our Numbers, Powerpoint presentation to Riverland Growers Breakfast meetings by Chris Byrne, Riverland Wine

Know Your Numbers

Chris Byrne
Riverland Wine

THE WINEGRAPE BUSINESS

As with all successful businesses, it is important to utilise available business tools that supports owners to develop a plan and ……

- Increase Income
- Reduce Costs
- Increase Wealth
- Manage Debt
- Achieve Work/Life Balance
- Succession Planning

KNOW YOUR NUMBERS

Important questions for Riverland Wine Grape Growers are…….

- How does your plan look?
- What are your performance indicators?
- How do you measure them?
- Do you ***Know Your Numbers***?

KNOW YOUR NUMBERS

For Wine Grape Growers, Know Your Numbers can help determine the Net Farm Return for a *crop year* for using data such as:

Income

- ❑ Yield X Price / tonne
  - ➢ Payment Summaries
  - ➢ Less Levies

Less Costs

- ❑ Overheads
- ❑ Variable costs
- ❑ Labour
- ❑ Depreciation

KNOW YOUR NUMBERS

Two important levers that increase profitability are *Increasing Income* and *Reducing Costs*. Know Your Numbers is designed to provide the data, charts, graphs and reports to plan for both of these.

Increase Income

- ❑ Margin per ha or /kg
- ❑ Most limiting resource

Reduce Costs

- ❑ Cost per tonne
- ❑ Cost per ha
- ❑ Overhead costs/variable costs/interest
- ❑ Value of your labour

KNOW YOUR NUMBERS

The Know Your Numbers System…….

- Uses data Wine Grape Growers already have
- Can be entered in their own time
- Is completely confidential
- Is simple and quick to do
- Tutorials and training sessions provided

KNOW YOUR NUMBERS

Business owners gather this information from……

Tax accounts (Quicken/MYOB), payment summaries, banking details, water notices, spray diaries etc….

WE HAVE DEVELOPED A CHECKLIST TO HELP



KNOW YOUR NUMBERS

Tutorial Checklist

Getting started

- ❑ Email address
- ❑ Password
- ❑ Laptop computer or iPad/tablet with wireless internet connectivity
- ❑ Wireless modem *(if you have one)*

KNOW YOUR NUMBERS

Tutorial Checklist

Property details

- ❑ Ownership and Business Details
- ❑ Size of property; property map if available
- ❑ Patch sizes, varieties and rootstocks
- ❑ Row widths, vine spacing's and years planted

KNOW YOUR NUMBERS

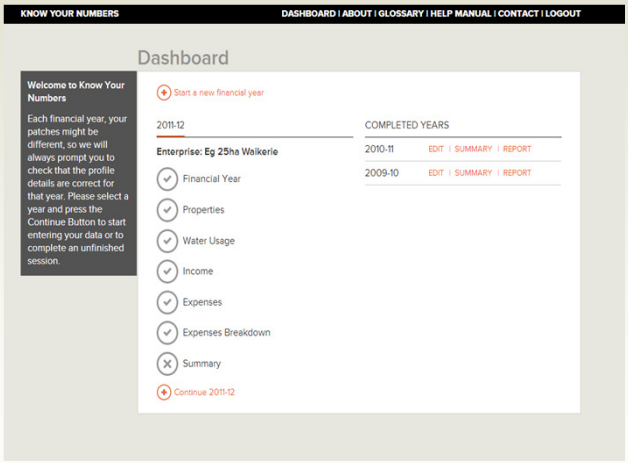
Tutorial Checklist

Financial data for the year inc:

- ❑ Water use – *from water statement (CIT/RIT)*
- ❑ Income for each patch – *from winery statement*
- ❑ Yield from each patch – *from winery statement*
- ❑ Current operating costs and overheads – *from last tax return*
- ❑ Labour costs – *including contract, permanent and casual labour*
- ❑ Depreciation– *if known*
- ❑ Interest costs

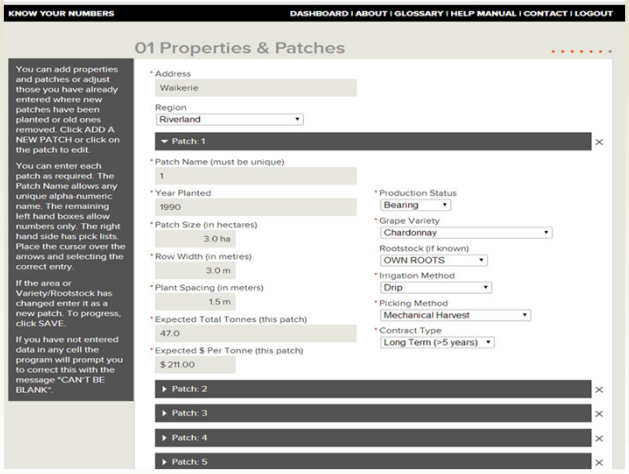
KNOW YOUR NUMBERS

- Creating the enterprise



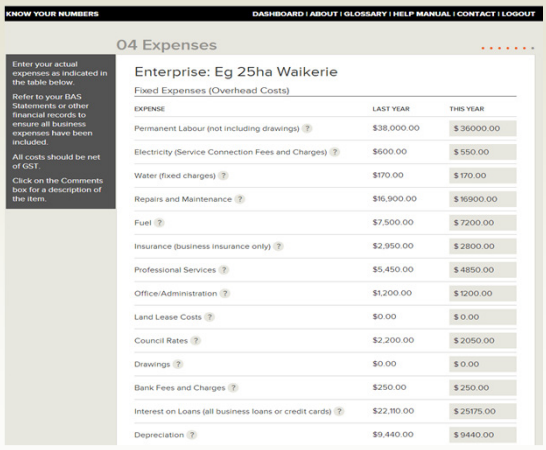
KNOW YOUR NUMBERS

- Adding the patches



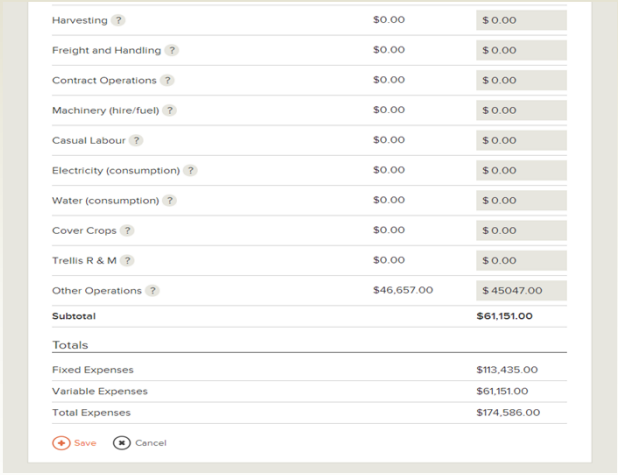
KNOW YOUR NUMBERS

- Operating Costs - Overheads



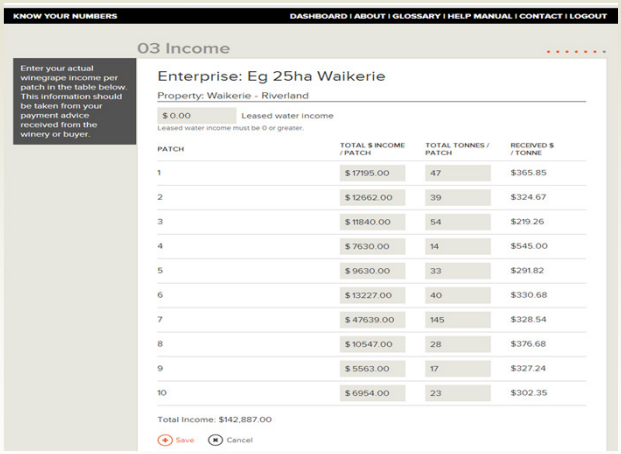
KNOW YOUR NUMBERS

- Operating Costs - Variable Expenses



KNOW YOUR NUMBERS

- Entering Income Detail



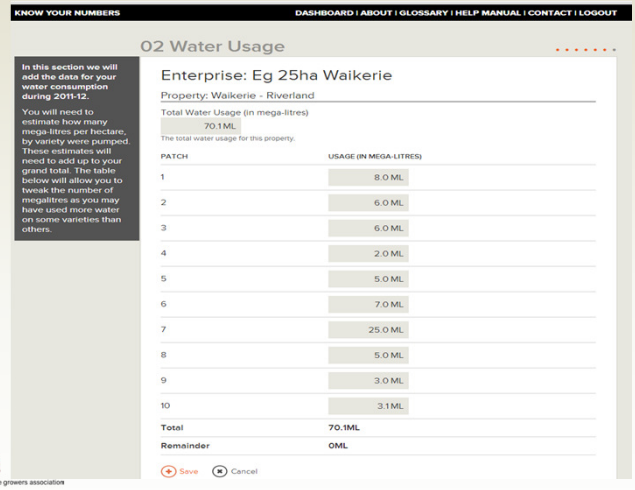
rwga riverland winegrape growers association

riverland wine

MRUG

KNOW YOUR NUMBERS

- Entering Water Use



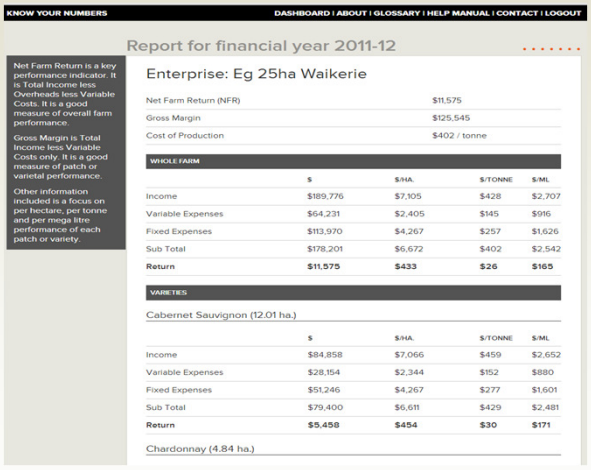
rwga riverland winegrape growers association

riverland wine

MRUG

KNOW YOUR NUMBERS

- Reports



KNOW YOUR NUMBERS — DASHBOARD | ABOUT | GLOSSARY | HELP MANUAL | CONTACT | LOGOUT

Report for financial year 2011-12

Net Farm Return is a key performance indicator. It is Total Income less Overheads less Variable Costs. It is a good measure of overall farm performance.

Gross Margin is Total Income less Variable Costs only. It is a good measure of patch or varietal performance.

Other information included is a focus on per hectare, per tonne and per mega litre performance of each patch or variety.

Enterprise: Eg 25ha Waikerie

Net Farm Return (NFR)	$11,575
Gross Margin	$125,545
Cost of Production	$402 / tonne

WHOLE FARM

	$	$/HA.	$/TONNE	$/ML
Income	$189,776	$7,105	$428	$2,707
Variable Expenses	$64,231	$2,405	$145	$916
Fixed Expenses	$113,970	$4,267	$257	$1,626
Sub Total	$178,201	$6,672	$402	$2,542
Return	**$11,575**	**$433**	**$26**	**$165**

VARIETIES

Cabernet Sauvignon (12.01 ha.)

	$	$/HA.	$/TONNE	$/ML
Income	$84,858	$7,066	$459	$2,652
Variable Expenses	$28,154	$2,344	$152	$880
Fixed Expenses	$51,246	$4,267	$277	$1,601
Sub Total	$79,400	$6,611	$429	$2,481
Return	**$5,458**	**$454**	**$30**	**$171**

Chardonnay (4.84 ha.)

rwga riverland winegrape growers association incorporated

riverland wine

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Do You Have Any Questions?

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Appendix 5c

- Know Your Numbers Checklist (May 2014) by David Pocock, 1pp

BEFORE ATTENDING THE KNOW YOUR NUMBERS TRAINING SESSION YOU MUST COMPLETE THE FOLLOWING CHECKLIST

Register for Know Your Numbers (KY#s) as per the following instructions:

- ❑ Click this link to Log on to the program: http://kyn-v2.katalyst.com.au
- ❑ If you have not previously used the program, Click on **sign up** and enter your email address, create and enter a password, confirm that password, click **sign up** again. You will receive a confirmation email almost immediately.
- ❑ When you receive the confirmation email click **confirm my account link** and you will be back on the Know Your Numbers website. You are now registered to use KY#.
- ❑ Whenever you return to the program, **sign in**, using your email address and password to log in.

When you come to the training session please bring:

- ❑ Laptop computer or iPad/tablet with wireless internet connectivity
- ❑ Wireless modem* *(if you have one)*
- ❑ **Make sure you remember your email address and your KY#s password**

You will also need to bring with you to the training session

Property Details:

- ❑ Ownership and business details
- ❑ Size of property *(hectares)*
- ❑ Property map if available
- ❑ Patch sizes *(hectares)*
- ❑ Varieties
- ❑ Rootstocks *(if known)*
- ❑ Row widths *(if known)*
- ❑ Vine spacings *(if known)*)
- ❑ Years planted *(if known)*

Financial Data for at least one financial year including:

- ❑ Water use – *from water statement (CIT/RIT etc)*
- ❑ Income for each patch – *from winery statement*
- ❑ Yield for each patch – *from winery statement*
- ❑ Operating costs and overheads - *from financial reports*
- ❑ Labour costs – *including contract and casual labour*
- ❑ Depreciation *(if known)*
- ❑ Interest costs

If you are unsure about any of this financial data, do your best and David Pocock will explain what you do not understand.

Appendix 5d

- Know Your Numbers - Users Manual (May 2014), by David R Pocock, 27pp. http://kyn-v2.katalyst.com.au/media/W1siZiIsIjIwMTQvMDUvMDgvMDRfMjNfMjlfNDA1X0tZX01hbnVhbFY5LnBkZiJdXQ/KY%23ManualV9.pdf

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KNOW YOUR NUMBERS USERS MANUAL



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Ownership

Riverland Wine has developed the program. Riverland Wine and AGWA jointly hold the intellectual property rights and copyright for the software.

Disclaimer

The Riverland Wine and its employees and officers do not guarantee that the software is without flaw of any kind or is wholly appropriate to your particular purpose and therefore disclaims liability for any error, loss, or other consequences that may arise from reliance on any information in this software. The results reported in this software are intended as a guide only and should not be relied upon as being representative of any region of property in the production of wine grapes.

SESSION 1

INTRODUCTION

Welcome to the Know Your Numbers Program developed by Riverland Wine. The program is designed to deliver a farm management view of profitability, risk and sensitivity for wine grapes on a whole farm, variety and patch basis. The first session will require you to read some detail about the program and proper preparation of your computer. This should take about 30 minutes.

Purpose of the Program

The Know Your Numbers (KY#) Program was developed to support growers in their decisions on profitability of their whole farm, varieties and individual patches. The program focuses on a simple input process of readily available information within accepted farm profitability conventions to deliver a meaningful farm profit (or loss) figure. It has been designed to deliver true net farm profit (or loss), not distorted by cash flow or tax considerations and contains the costs and income that relate to a specific crop year.

Origins of the Program

The program was conceived in grower workshops held in 2005 when grower returns were diminishing. Drought conditions had started to affect the region but the full impact of water restrictions and poor commodity prices were yet to fully impact on the industry.
The program was required to assess the impact of a number of partial budgeting scenarios on a specific farm to assess the impact of increased (or reduced) irrigation or other inputs and what impact that may have on yield or price to ensure the property has maximised return for inputs. Many growers lack an easy way to accomplish this with any degree of reliability and hence the assessment of potential risk of options. The program has been developed to enable participants with limited computer skills to put in the necessary data and generate a series of basic reports and graphs on whole farm, variety and patch performance.

Support

Riverland Wine supports the program for delivery primarily by the Internet. This offers growers the ability to work in their own time, using a simple entry method while maintaining control of their records and confidentiality, key elements for their participation. Regular introductory sessions, tutorials and workshops are held to support the participants in a group setting. This manual is part of the off line support and can be accessed online.

PRE-REQUISITES – TECHNICAL AND FINANCIAL

Computer Requirements

The Know your Numbers Program requires users to have the following;

- A computer that has access to the internet
- Basic keyboard skills
- A set of accountant's reports for the most recent tax year.
- A set of farm records with basic records of patch information, yields, irrigation and process.

Session 1 requires you to assemble this information.

In workshops and tutorials participants will require a laptop computer that can connect to a wireless network.

In advanced tutorials a set of computer based accounting records is required along with detailed resource use records (spray diaries, fertiliser use, irrigation use).

This program is designed to be intuitive and avoid repetition of data entry where possible, and calculate totals and other figures for you.

Data Records Required

Simple Analysis Data

- Ownership and Business details
- Size of property – area in production, total farm area
- Patch area, crop type, and variety
- Water Use
- Income and yield for crop type, patch and variety
- Current costs (operating and overhead)
- Expenses breakdown (from tax returns (Profit & Loss Statement) or farm records)
- Labour Units

Advanced Analysis Data

Data as required for Simple Analysis above, plus:

- Machinery Details including hour usage, fuel and repairs by machine
- Water use by the patch
- Detailed electricity usage
- Fertiliser use by patch including fertiliser analysis.

MENUS & NAVIGATION

Program Structure & Linkages

The diagram below indicates the program layout and is a reference for new users.

Figure 1 Program Structure

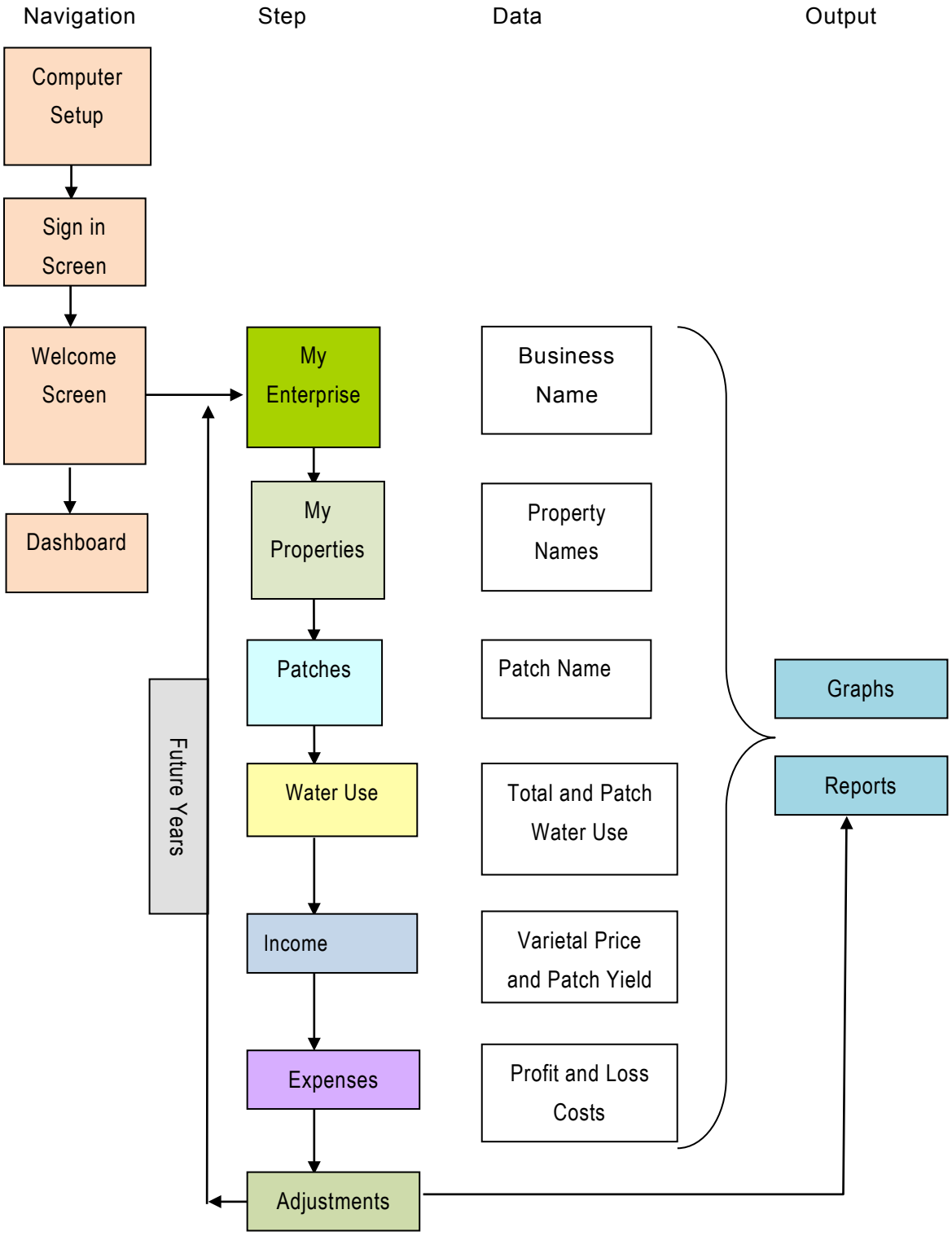


Table of Options, Links and Actions

Figure 2

Menu	Options	Links / Actions
Navigation	Internet Browser	WAN Connection, Server Connection
	Sign up and Sign in	Connecting to your secure data
	Welcome Screen	Enterprise Details
	Dashboard	Monitor progress and edit data
Steps - Data Entry	Enterprise Name	Enter your trading name
	Property Names	Enter multiple properties
	Patches	Enter Patch Name, Variety, Contract Details
	Water Use	Enter Total water use and adjust per patch
	Income	Enter income per variety and tonnes per patch
	Enter Expenses	Enter fixed and variable costs
	Enter Adjustments	Adjust expenses by the patch
	Edit Data	Edit any data at his point
	Finish	Critical step that prevents any further changes
	Future years	Enter additional years
Reports	Tables	Net Farm Return
		Return by Variety or Patch on a /ha, /tonne and /ML basis
	Graphs	Whole Farm Income vs costs for multiple years
		Cost Analysis Graph
		Income vs costs for multiple varieties
		Income vs costs for multiple patches

Computer Setup

Connecting to a wireless network

Your computer must be connected to the Internet using a modem linked through the telephone system. There are several options that may be used including wireless modems linked to either a landline or the 3G network. If you are not connected you should seek assistance from a local retailer to establish the connection. This should occur before attending a tutorial.

Turn WiFi on enabling your computer to detect local networks.

Click on the appropriate network usually a WAN in your home or office.

Enter the *password* to link you to the modem.

Click on your Internet Browser (Internet Explorer or Safari)

Saving your Connection to favourites

To connect to the Know your Numbers program insert the following in the Toolbar of your Internet browser.

Type in *http://kyn-v2.katalyst.com.au/*

This will log you into the Know Your Numbers program.

When the first screen of Know Your Numbers comes up you can save it to Favourites by Clicking *Favourites Add*. Call it KY#. You can click and drag this item in your favourites list to the desktop for quick access at any time.

Sign up and Sign in

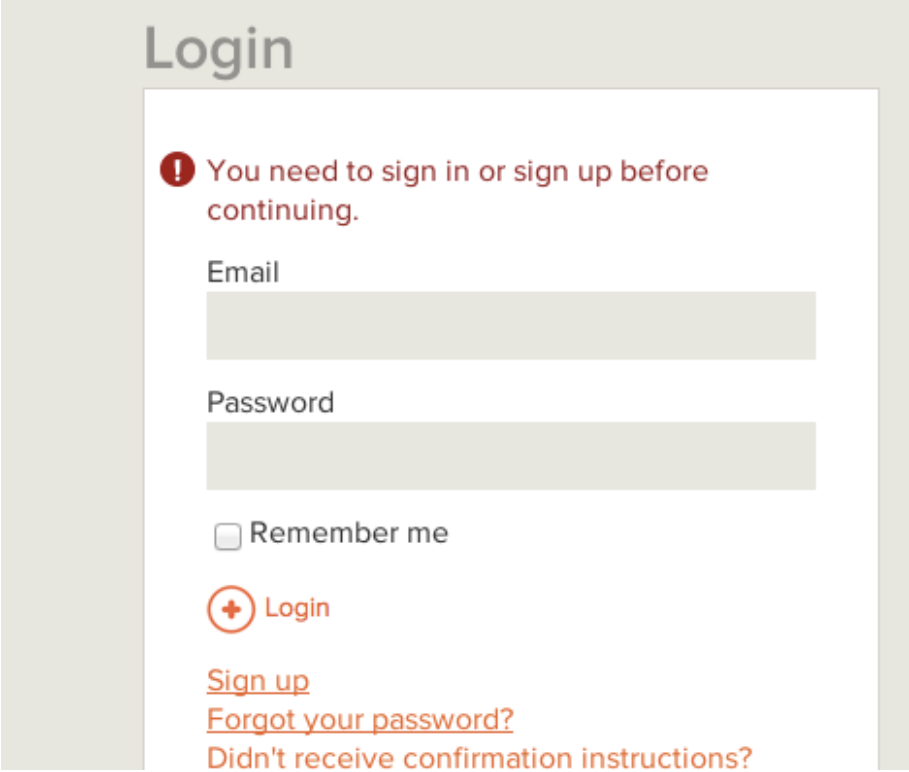
All data collected is saved on a secure server and is then accessible from the point you finished in your last session.

Registering and logging on

If this is your first session on the program you will need to SIGNUP first. This registers your details and enables the program to recognise and provide your data.

You should use your usual business email address. The password is best kept simple using a combination of capitals, alpha characters and numbers that you can easily recall. The security of this password is not as important as for banking passwords and a banking password should not be used. For example you could use a property name and your age "Loxton56". You will be asked to enter this password twice in the signup process. Click Remember me then Press SIGNUP first.

Figure 3 Login



An email will be sent to confirm you are registered to this email address. You will need to confirm this email before continuing so the server recognises you.
If you have used the program before, you enter your email address and password from an earlier session and select Login. You will then enter the program where you last used it.

Opening, Saving & Setup

On each new session the program will open up where you last left it. Unlike computer based programs there is no need to Save or backup the data as it is held remotely on a secure server.

General Data Input Rules

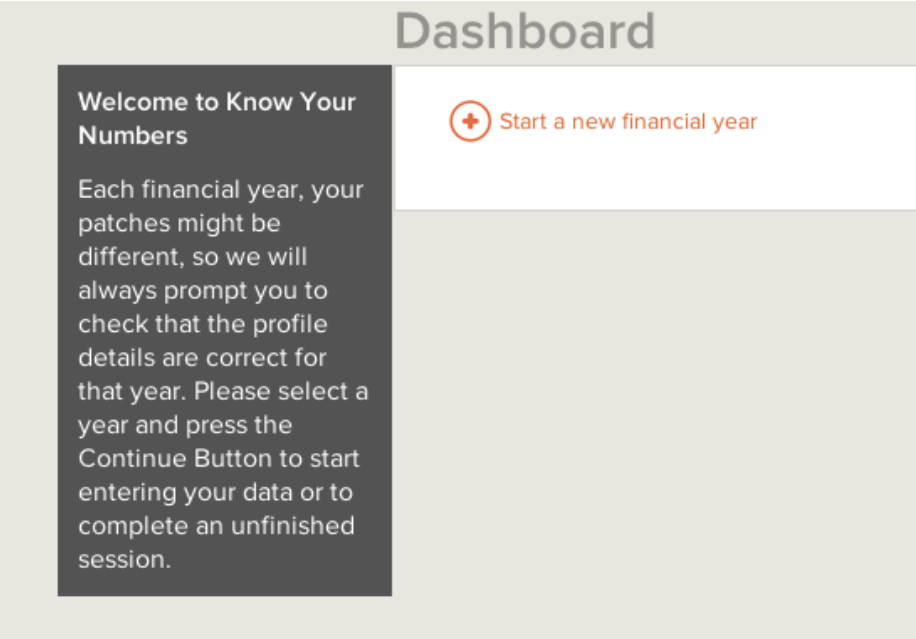
Data entry is allowed in the grey cells. You can move up and down the entry boxes using the arrow keys. All other cells are protected and cannot be altered. Click the SAVE button at the end of each screen to progress.
Some cells have COMMENTS to assist with your entry. To view the comments, hover your mouse over a cell.
Some cells will allow only some types of data in those cells (numeric or a pick list) and respond with an error message if data is entered wrongly. You must enter data in some cells to progress and the message "CAN"T BE BLANK" will occur if this is the case.

SESSION 2

Dashboard

In this session you will require your trading name, property names, a year for analysis and all patch details. Now you are ready to start entering data. This session will take up to 1 hour. Most people can achieve this as long as they have organised their records first.

Figure 4 Dashboard

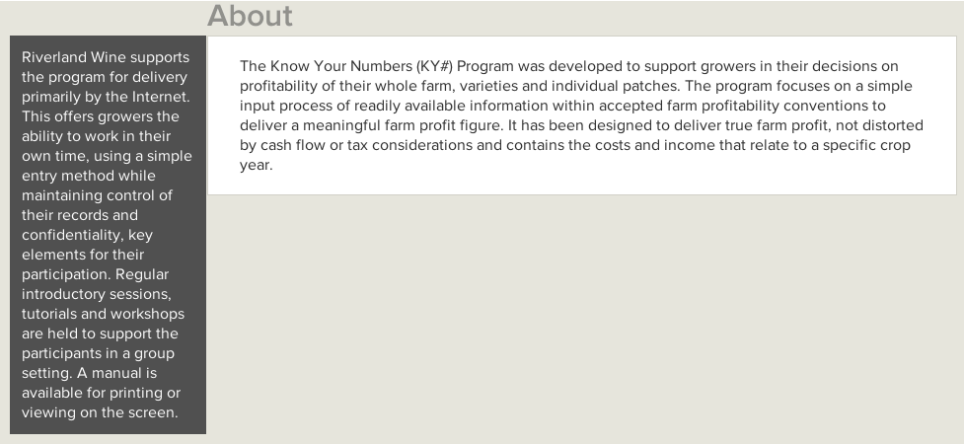


The Dashboard enables users to determine their progress in data entry and to alter the position within the program to edit, summarise or report on current data. As you build your data, you will find the dashboard will become much more detailed. A small series of dots appears in the top right of the screen to indicate your progress.

About

On the top right of the screen is an introduction to Know Your Numbers.

Figure 5 About



Contact

If you have any issues difficulties or suggestions for the program a contact address is supplied.

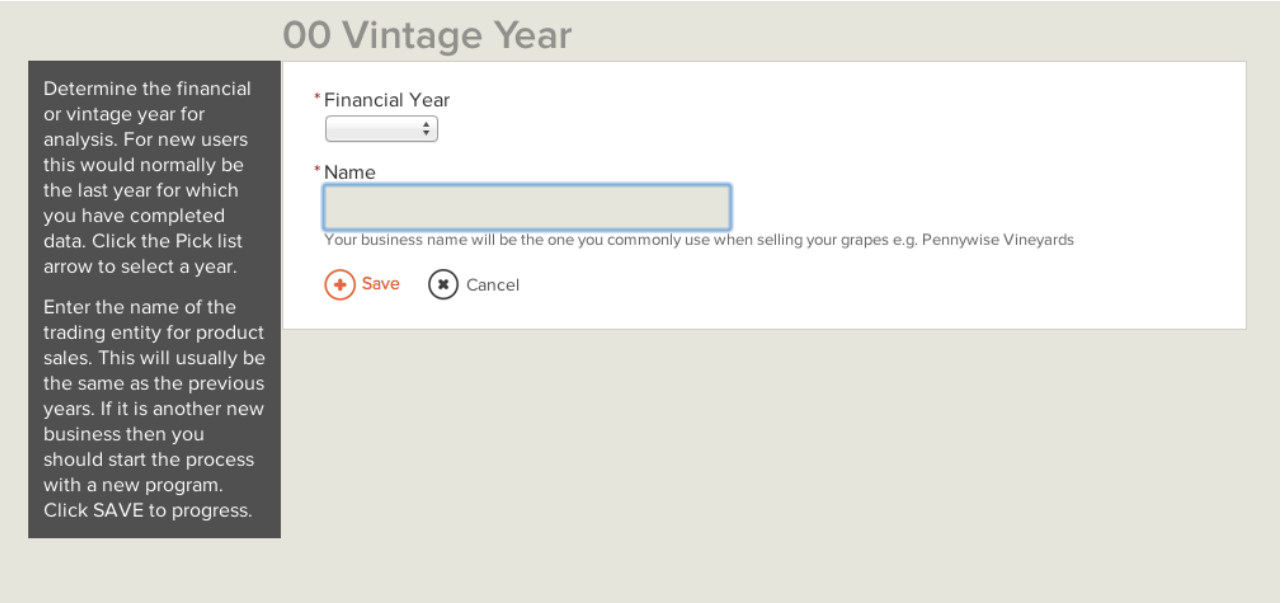
Figure 6 Contact Details



Vintage Year

The first step is to determine the financial or vintage year for analysis. For new users this would normally be the last year for which you have completed data.

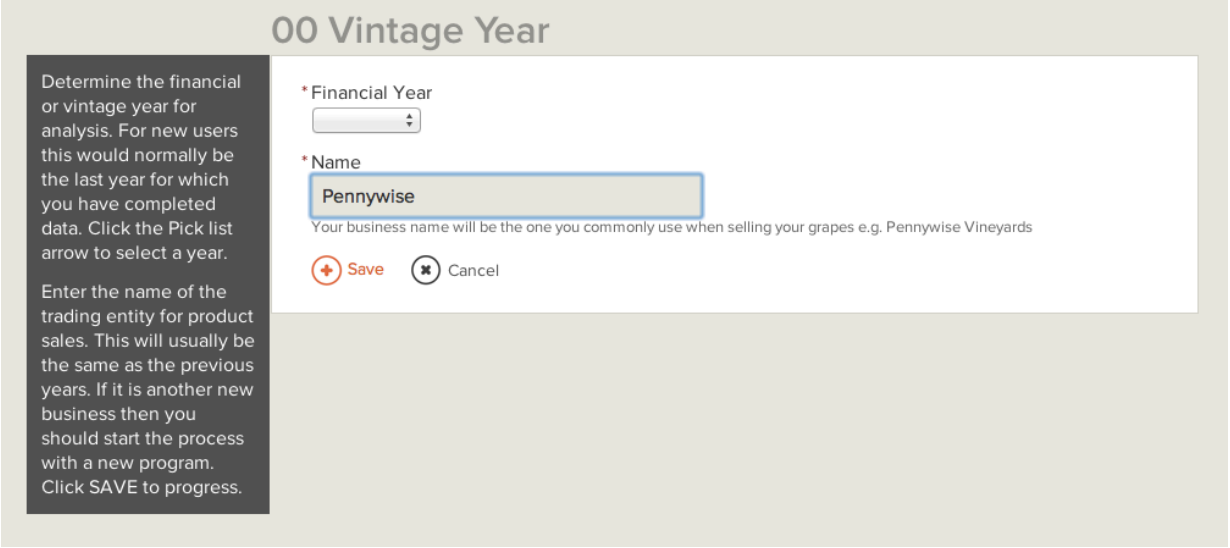
Figure 7 Vintage Year



This enables familiarity with the program while dealing with information that is current for the operator. Click the Pick list arrow to select a year. The next year can be entered if you wish to budget or estimate a future year.

Enter the name of the trading entity. This will usually be the same as the previous years. If it is another business, then you should start the process with a new program. Click SAVE to progress. In this session you will require your trading name, property names, a year for analysis and all patch details.

Figure 8 Trading Name



Additional properties added under the same trading name can be added in the next screen.

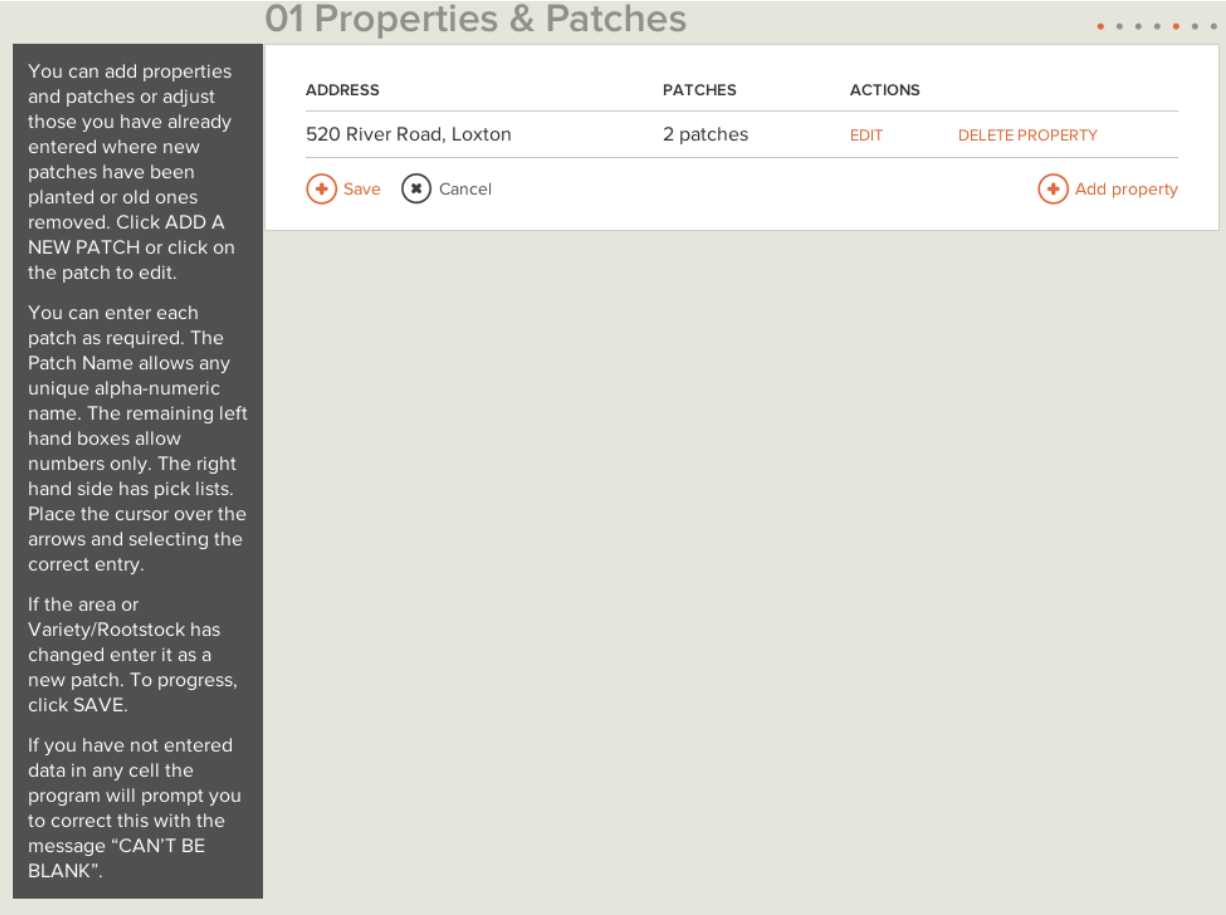
Properties and Patches

You can now add properties and patches or adjust those you have already entered where new patches have been planted or old ones removed.

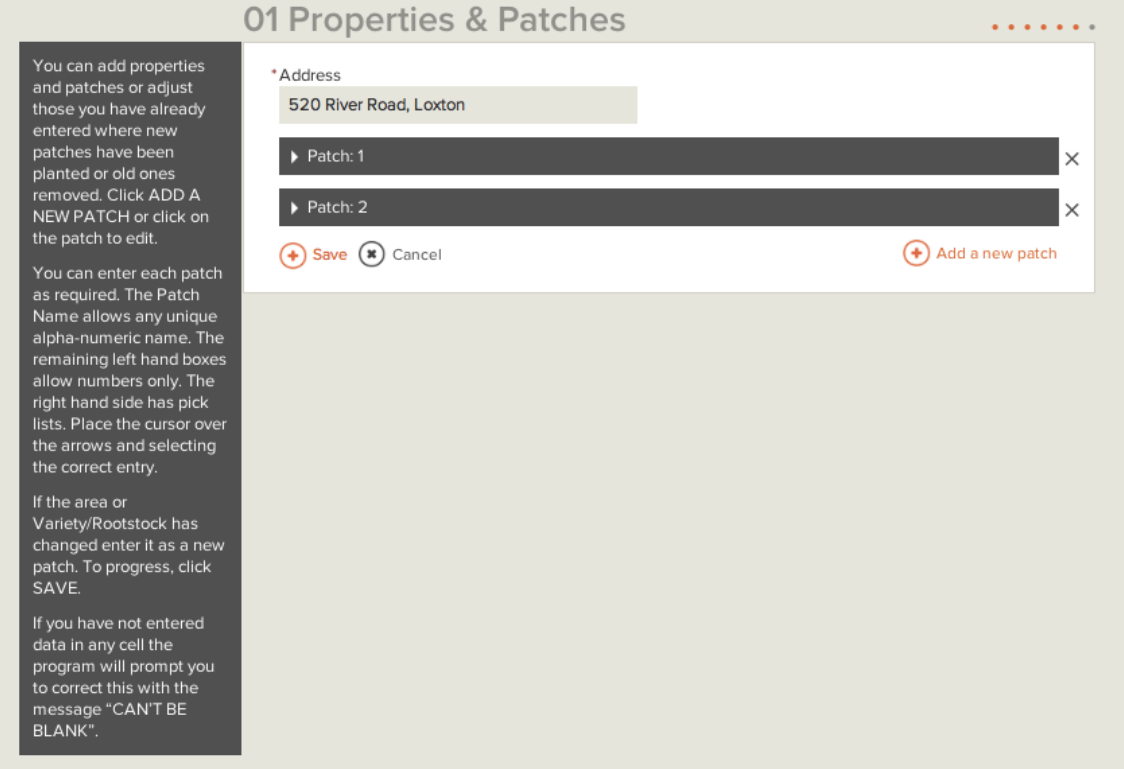
On the screen shown below on the line with the property address EDIT and DELETE A PROPERTY are for property changes, not patch changes. If you press DELETE on this page you will delete all patches for that property. There is a warning given before this occurs and it is irreversible.

If you have a second property run under the same trading name you can ADD A PROPERTY on the screen below. Enter the Region from the pick list.

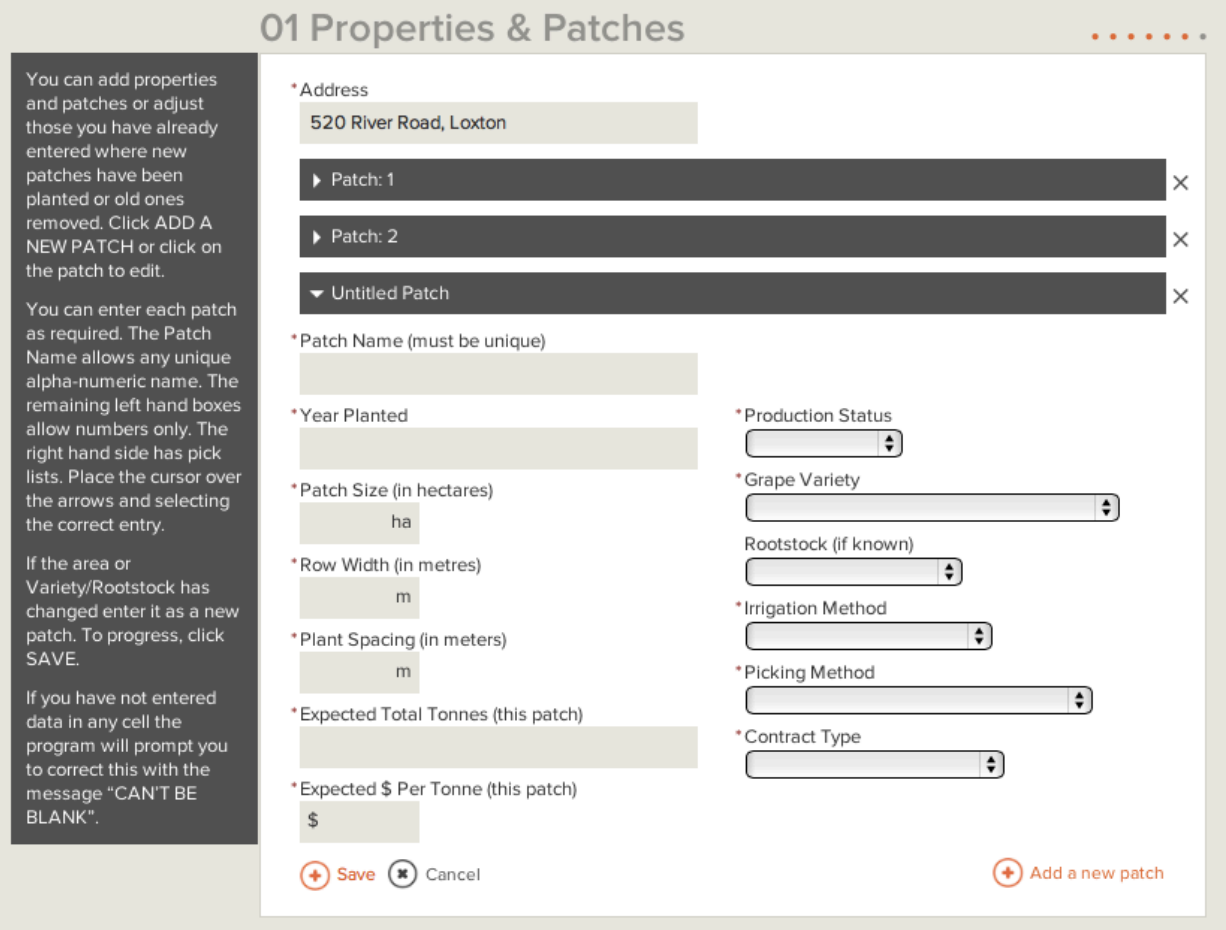
Figure 9 Properties and Patches



Click ADD A NEW PATCH



You can now enter each patch as required. The left hand side of the page allows any alpha-numeric characters. The right hand side has pick lists. Place the cursor over the arrows and select the correct entry.



On completion press ADD ANOTHER PATCH or SAVE to conclude patch entry.

If the area or Variety/Rootstock changed enter it as a new patch. This will return you to the 01 Properties and Patches Screen. To progress, click SAVE.

If you have not entered data in any cell the program will prompt you to correct this with the message "CANT BE BLANK"

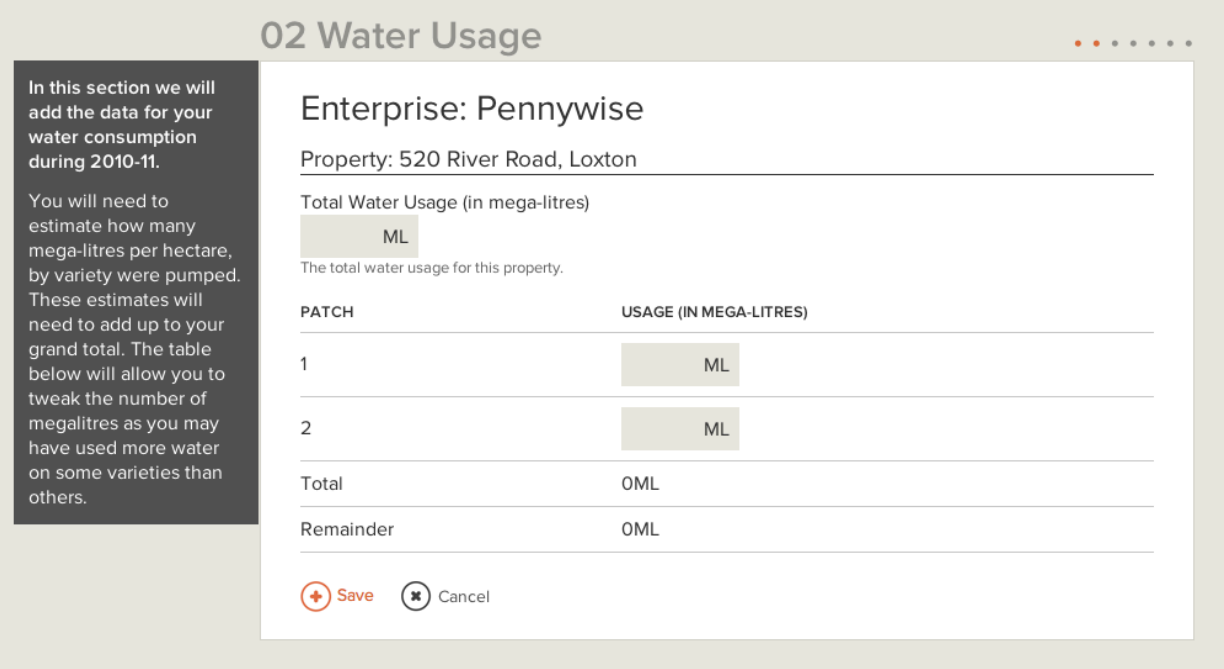
When you have saved the data you will see the summary screen below. You can EDIT the patches already entered or delete ALL patches. If you have an additional property under the same business name you can now go through the same process for that property.

SESSION 3

Water Use

In this session you will require your irrigation records and should take less than 20 minutes. You will require total water used in the year and patch usage if this exists. Total water usage is initially allocated on a hectare basis.

Figure 10 Water Usage



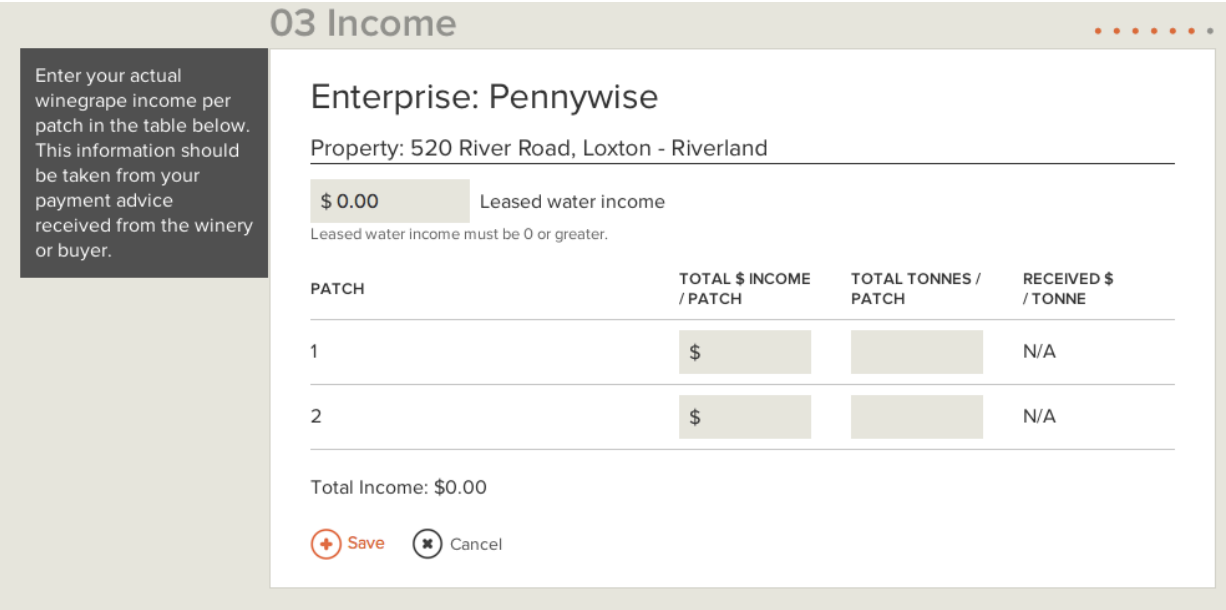
Water usage is determined from the Total Water Usage of all Irrigation meters on the property over the financial year to 2 decimal places. This will be available from water authorities, or your own records. Initially water use is allocated on the basis of area, however you may wish to change this allocation to reflect different patch needs such as age, variety or soil type. The Remainder at the bottom of the page should be 0 to progress.

SESSION 4

Income

This session summarises your income and should take around 20 minutes. Your delivery summaries will contain this information. You can enter estimates into this sheet and re-edit the accurate data later.

Figure 11 Income



If water is leased out you can apply that income here. You must enter a number here. It can be 0.

Earlier you provided an estimated income for each patch. This screen records income actually received. It can be adjusted later if necessary. Be careful not to enter charges deducted from the gross receipts with freight, levies and other charges in the expenses section.

Click SAVE to continue.

SESSION 5

Expenses

This section covers all expenses and will take up to 1 hour. You should use your last financial statements from the accountant. Computer based accounting packages will also provide the same information. Expenses are divided into Fixed and Variable expenses.

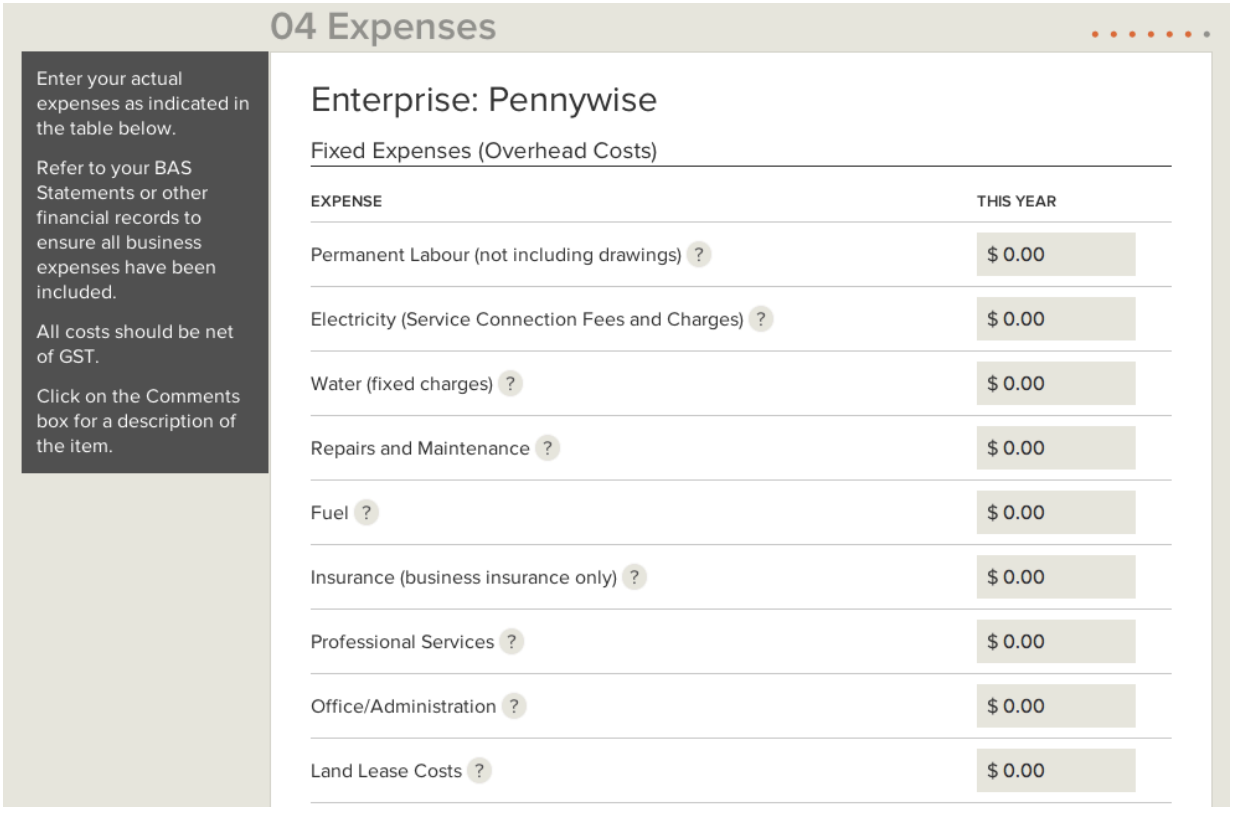
Fixed Expenses

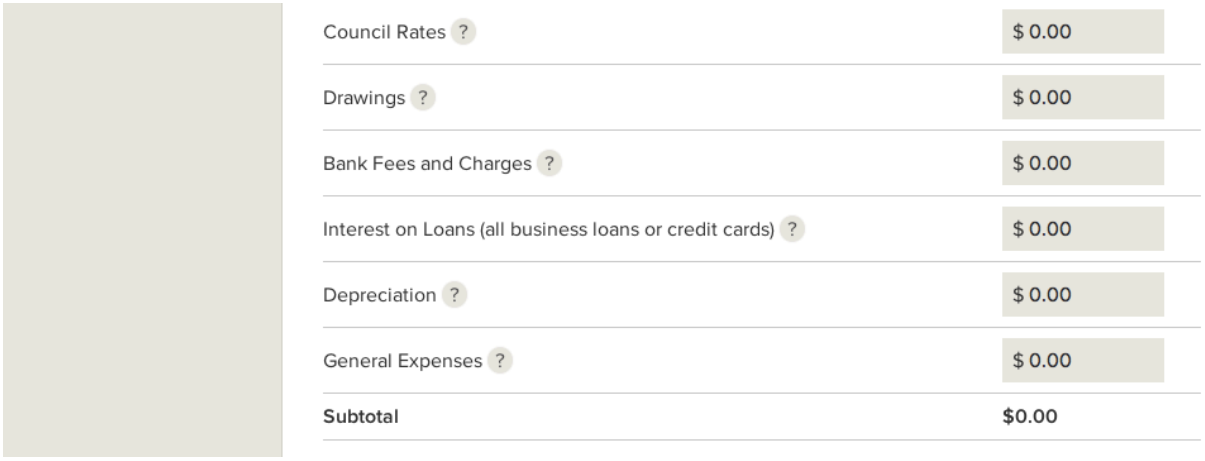
Fixed expenses are those that do not vary with changes in the level of activity in the business. Rates, Electricity connection charges, Insurance are good examples where these costs are incurred regardless of whether the business is operating at full or half capacity.

Variable costs relate directly to Enterprise activity and include chemical use, casual labour, harvesting and freight. The more patches that are in production and the higher production levels are the higher these costs tend to be.

All costs entered should be net of GST. Most accounting packages present data in this form.

Figure 12 Fixed Expenses





Each cost is defined in the list below and is available by clicking the question mark on each category;

FIXED COSTS

Permanent Labour; Wages or Salaries paid to workers employed all year. Superannuation, Work Cover and other benefits should be included. No owner labour is included.

Electricity (Service Connection Fees and Charges); Any Supply, Service or Standing Charges based on an annual fee. These are listed on each monthly Tax Invoice.

Water (Fixed Charges); Charges based on access to the Water Resource and delivery infrastructure and not dependent on any consumption. Includes NRM levies.

Repairs and Maintenance; Any Repairs and Maintenance on machinery, plant, buildings or irrigation. Allowance should be deducted for private use and hobbies.

Fuel; All Diesel, Petrol, Gas and Oil. The expense should be net of excise on off-road use. Allowance should be deducted for private use and hobbies.

Insurance; All business insurance. Include building, product, public liability insurance. Exclude house and contents insurance and any non-business vehicles.

Professional Services; Includes accountancy, legal fees and consulting fees.

Office /Administration; Includes Computer software, stationery, printing.

Land Lease Costs; Land lease is an alternative to ownership of land and substitutes a capital cost for an annual fee for the use of land.

Council Rates; Local council rates on all property including waste management levies.

Drawings; Operator drawings are an alternative to wages and tend to be highly variable. The most accurate method is to apply what wages would be paid to staff in the same position.

Bank Fees and Charges; include overdraft facility fees, credit card fees (not interest) and account/transaction fees.

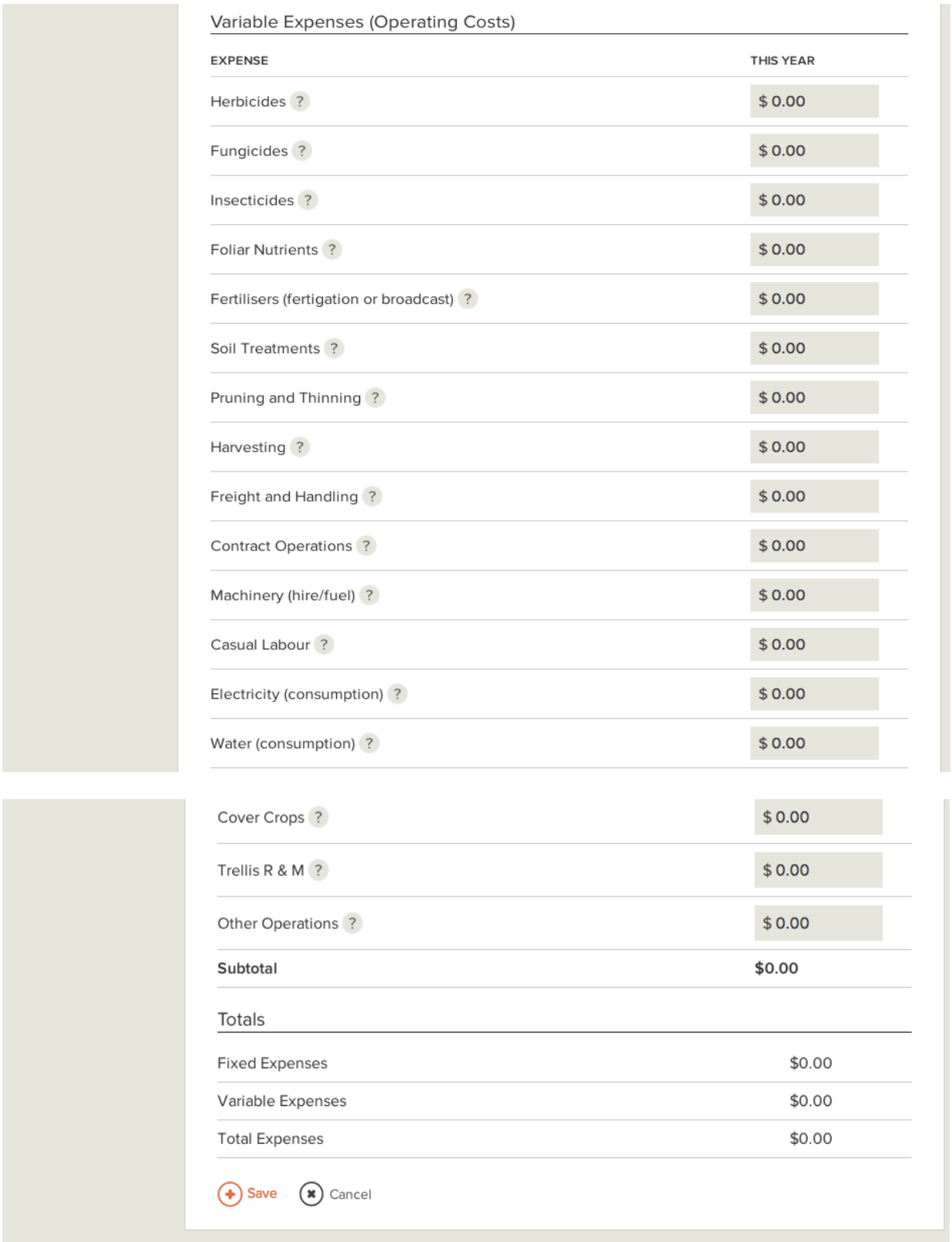
Interest on Loans; Include all Interest to any party including interest accrued but not paid in this year such as private loans.

Depreciation; Initially depreciation from taxation records can be used. A calculator for more accurate management depreciation is included in this program.

General Expenses; may include advertising, travel and protective equipment.

Variable Costs

Figure 13 Variable Expenses



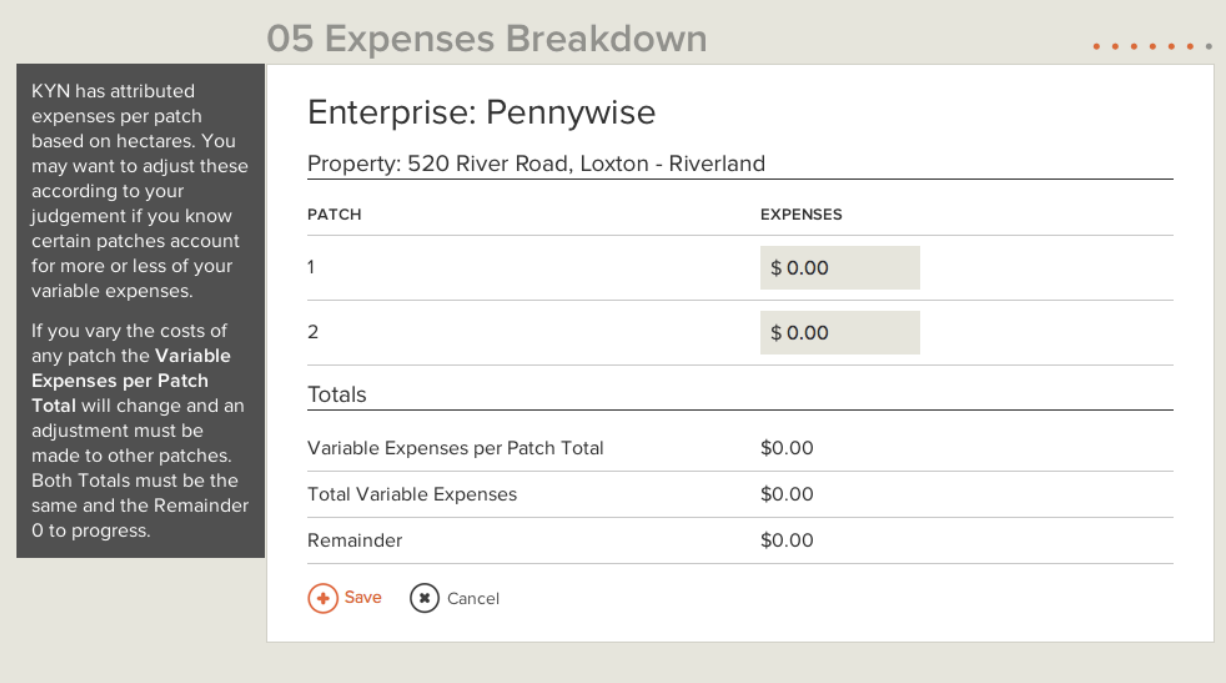
Click on the ? symbol for help.

Herbicides; Include all ground applied herbicides and adjuvants. May include pre-emergent chemical applied through a drip system.
Fungicides; All canopy applied fungicides and may also include some materials applied through fertigation, and applied to harvested fruit.
Insecticides; Include ground and canopy applied chemicals.
Foliar Nutrients; Include all canopy applied nutrients usually applied with a canopy sprayer.
Fertilisers; Include all fertilisers applied via fertigation, broadcast, injected or drilled into the orchard. Manures should be included here.
Soils Treatments; Include Nematicides, Soil Conditioners such as gypsum and lime.
Pruning and Thinning; Only include contractor services here. Any permanent or casual labour used for pruning is accounted for elsewhere.
Harvesting; Contract harvesting costs not including casual labour paid directly by the business.
Freight and Handling; Only include freight where it is paid for directly by the business. Some freight may be deducted directly from receipts and should not be included or fruit may be sold on a farm gate basis.
Contract Operations; Include any other operations paid for on a piecework basis for machinery hire and labour combined.
Machinery (hire/fuel); For hire of machinery only.
Casual Labour; Include labour hired on a short-term basis for labour only. Ensure all Superannuation and WorkCover are included.
Electricity; Include all power consumption used on a /kWh basis.
Water; Include all water charges based on a /ML basis
Cover Crops; Includes cost of seed only. Fertiliser that is applied should be included as a fertiliser cost.
Trellis R&M; Include all Trellis repairs, posts, wire and strainers. New trellis can be placed here but must be allocated to the block development it was used on.
Other Operations; Will cover operations that may be used on other crops, not widely used in grape growing.

Adjustments

The final step in the process is to adjust the expenses to reflect higher or lower cost blocks. Fixed expenses are allocated on a per hectare basis. Variable costs can be adjusted by the patch.

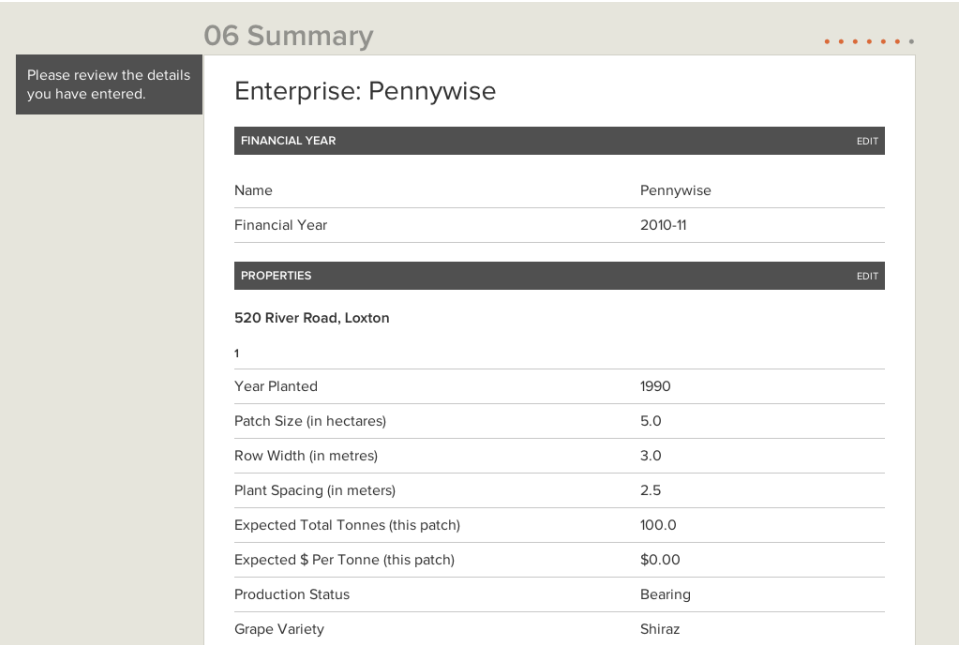
Figure 14 Adjustments



The remainder at the bottom of the page must be zero to progress. Press SAVE to continue.

Summary

This screen enables any data entered to this point available to edit. Only a short part of the screen is shown in the screenshot. Press EDIT on the right side of each section to edit your data.



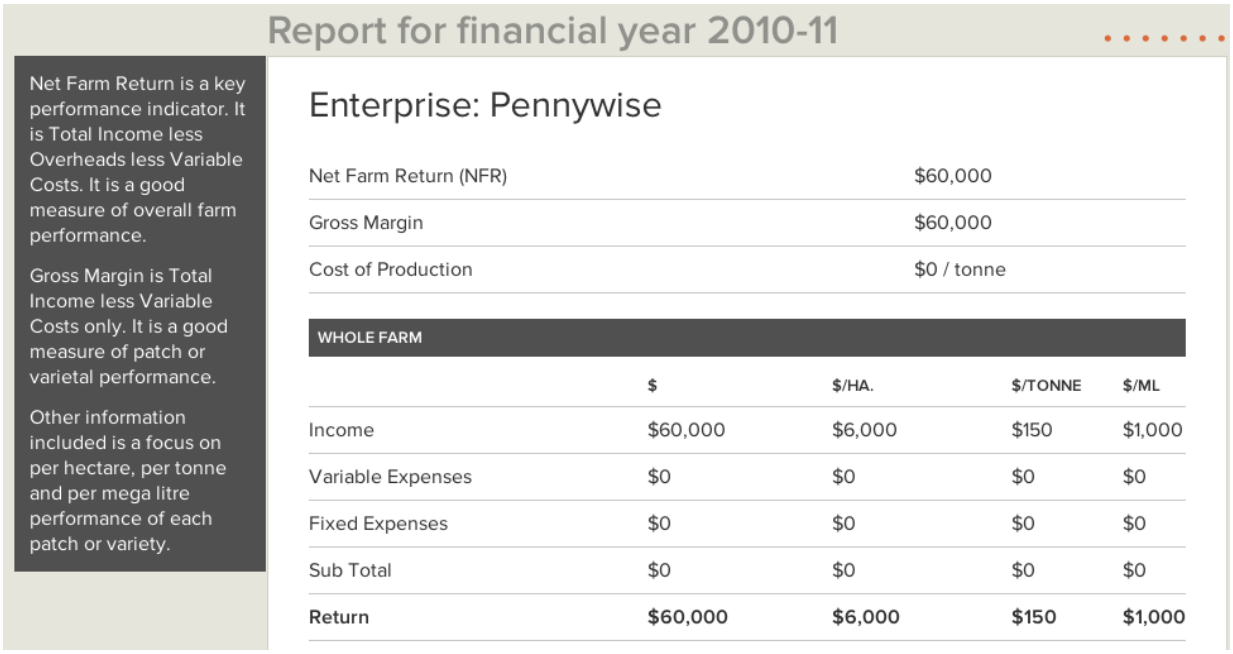
If you have a high level of confidence in the data entered to this point you may choose to click FINISH. It is important to note your data can be edited after you click FINISH by using the EDIT tab in the Dashboard. A summary report is then available.

SESSION 6

REPORTS

Short Report

The initial report is text only and reports on property, patch, variety and water use efficiency.



Report for financial year 2010-11

Net Farm Return is a key performance indicator. It is Total Income less Overheads less Variable Costs. It is a good measure of overall farm performance.

Gross Margin is Total Income less Variable Costs only. It is a good measure of patch or varietal performance.

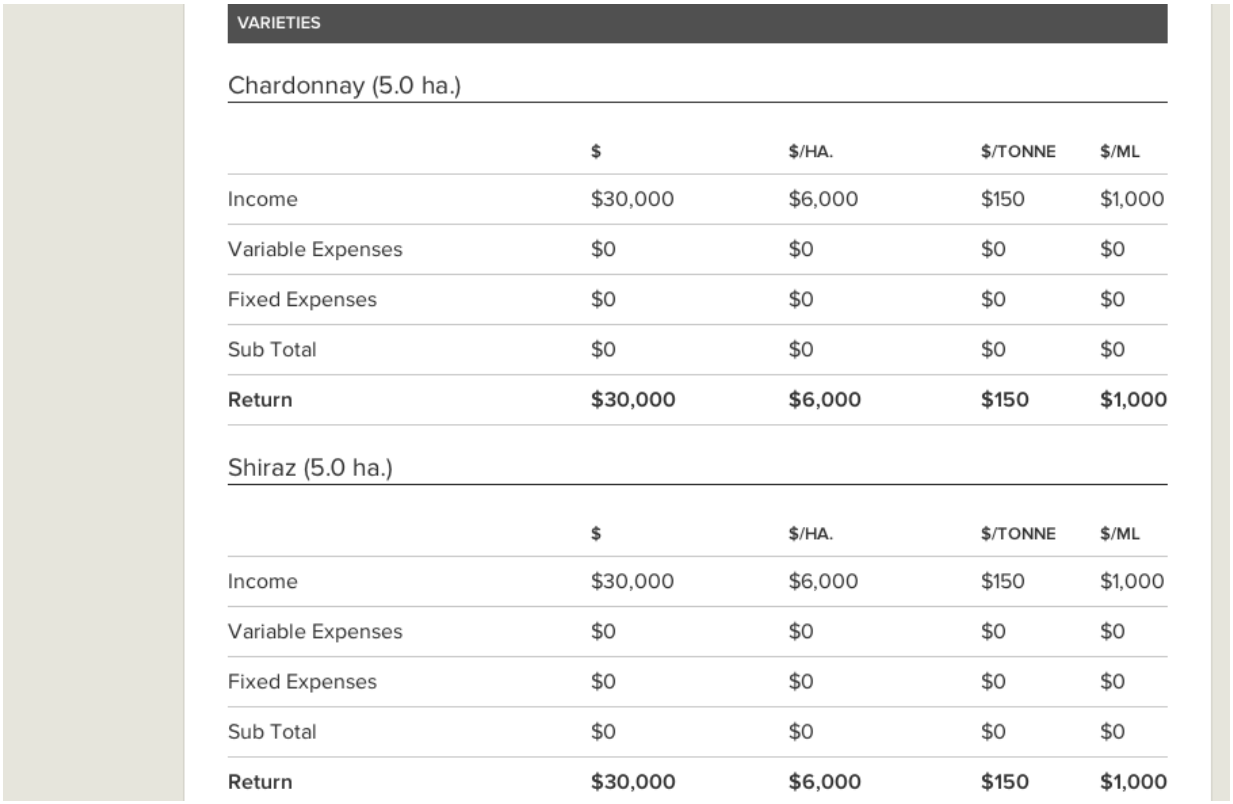
Other information included is a focus on per hectare, per tonne and per mega litre performance of each patch or variety.

Enterprise: Pennywise

Net Farm Return (NFR)	$60,000
Gross Margin	$60,000
Cost of Production	$0 / tonne

WHOLE FARM

	$	$/HA.	$/TONNE	$/ML
Income	$60,000	$6,000	$150	$1,000
Variable Expenses	$0	$0	$0	$0
Fixed Expenses	$0	$0	$0	$0
Sub Total	$0	$0	$0	$0
Return	**$60,000**	**$6,000**	**$150**	**$1,000**



VARIETIES

Chardonnay (5.0 ha.)

	$	$/HA.	$/TONNE	$/ML
Income	$30,000	$6,000	$150	$1,000
Variable Expenses	$0	$0	$0	$0
Fixed Expenses	$0	$0	$0	$0
Sub Total	$0	$0	$0	$0
Return	**$30,000**	**$6,000**	**$150**	**$1,000**

Shiraz (5.0 ha.)

	$	$/HA.	$/TONNE	$/ML
Income	$30,000	$6,000	$150	$1,000
Variable Expenses	$0	$0	$0	$0
Fixed Expenses	$0	$0	$0	$0
Sub Total	$0	$0	$0	$0
Return	**$30,000**	**$6,000**	**$150**	**$1,000**

PATCHES

1 (Shiraz)

	$	$/HA.	$/TONNE	$/ML
Income	$30,000	$6,000	$150	$1,000
Variable Expenses	$0	$0	$0	$0
Fixed Expenses	$0	$0	$0	$0
Sub Total	$0	$0	$0	$0
Return	**$30,000**	**$6,000**	**$150**	**$1,000**

2 (Chardonnay)

	$	$/HA.	$/TONNE	$/ML
Income	$30,000	$6,000	$150	$1,000
Variable Expenses	$0	$0	$0	$0
Fixed Expenses	$0	$0	$0	$0
Sub Total	$0	$0	$0	$0
Return	**$30,000**	**$6,000**	**$150**	**$1,000**

WATER REPORT

Total Water Use	60.0 ML
Water Use/ha.	6.0 ML

Varieties

VARIETY	ML/VARIETY	ML/HA.	RETURN/HA.
Chardonnay	30.0 ML	6.0 ML	$6,000
Shiraz	30.0 ML	6.0 ML	$6,000

Patches

VARIETY	ML/VARIETY	ML/HA.	RETURN/HA.
1	30.0 ML	6.0 ML	$6,000
2	30.0 ML	6.0 ML	$6,000

Done

FINANCE COSTS

Interest payments plus bank fees

Total	$0
$/tonne	$0.00
$/ha.	$0

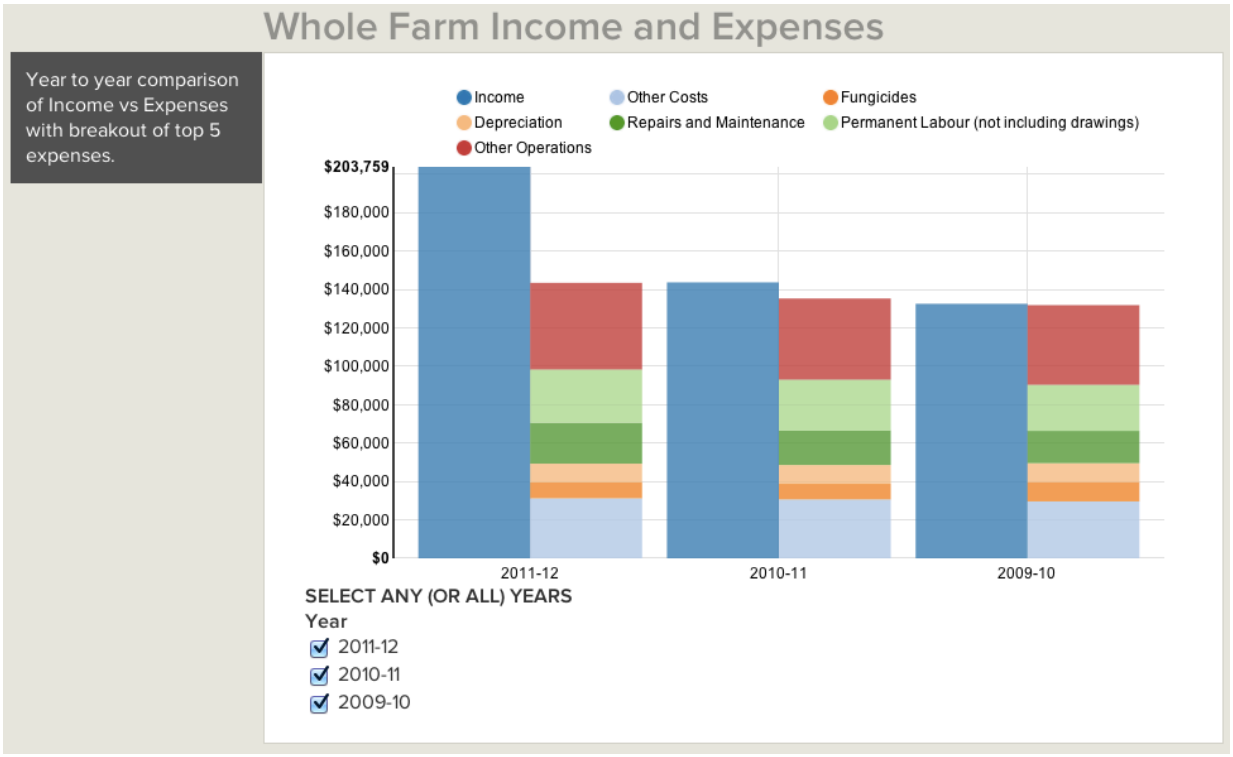
Graphs of Performance

There are 5 forms of graphs and a Depreciation Calculator provided selected on the menu bar as REPORTS.



Whole farm income and expenses (1.)

This graph enables whole farm profitability to be assessed using income and costs, and previous years to be used. The years are selectable, with the five major costs in the latest year used as a benchmark for the other selected years.

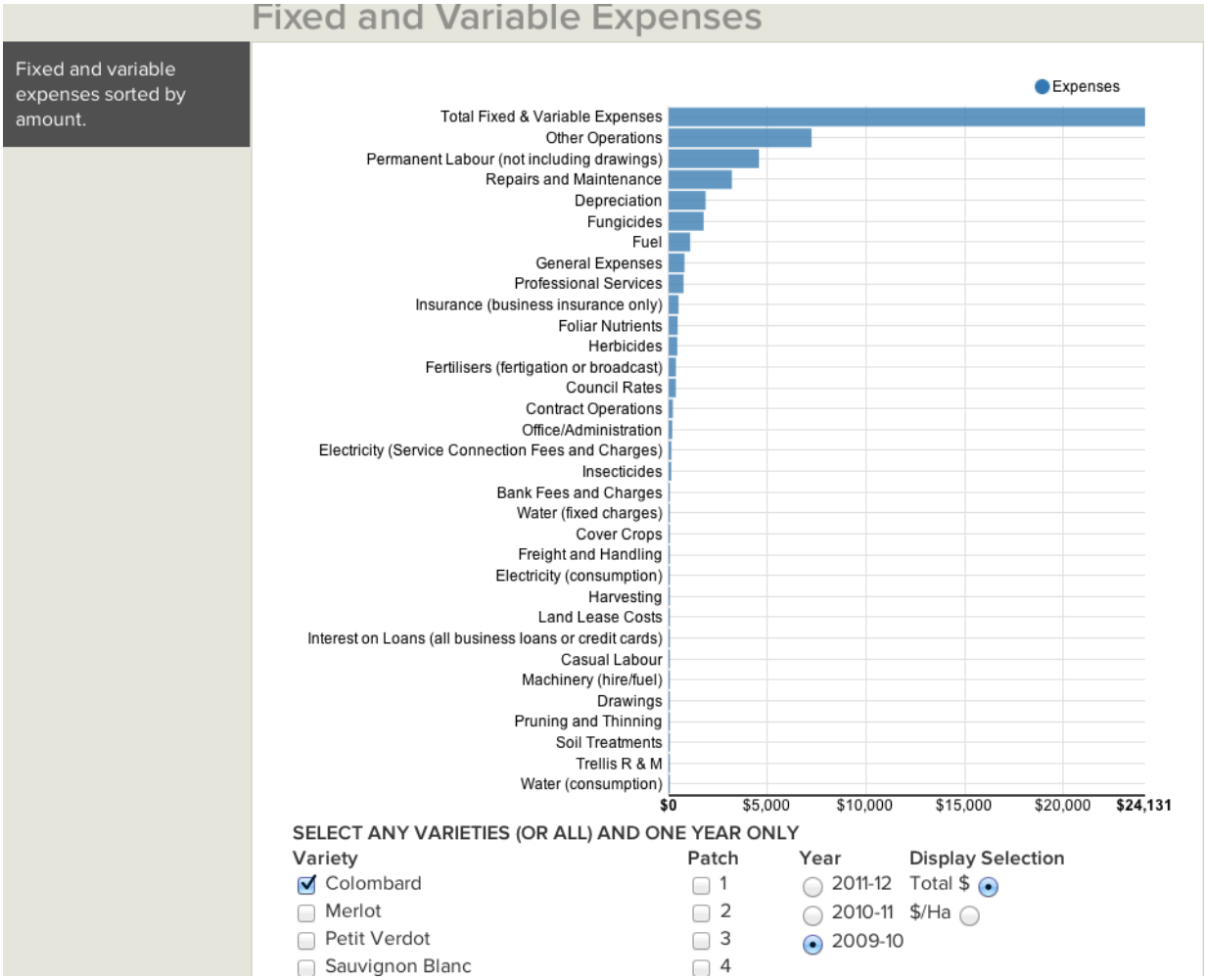


If cost categories change in the earlier years to become higher than in the latest year the graph will not indicate this, but it is easily viewed in the Cost of Production Graph below.

Fixed and Variable Expenses (2)

This graph will display costs of production on a total or per hectare basis for selectable varieties or patches for any single year.

The graph is valuable in assessing the most significant and most sensitive costs. Reporting can occur in only 1 format.

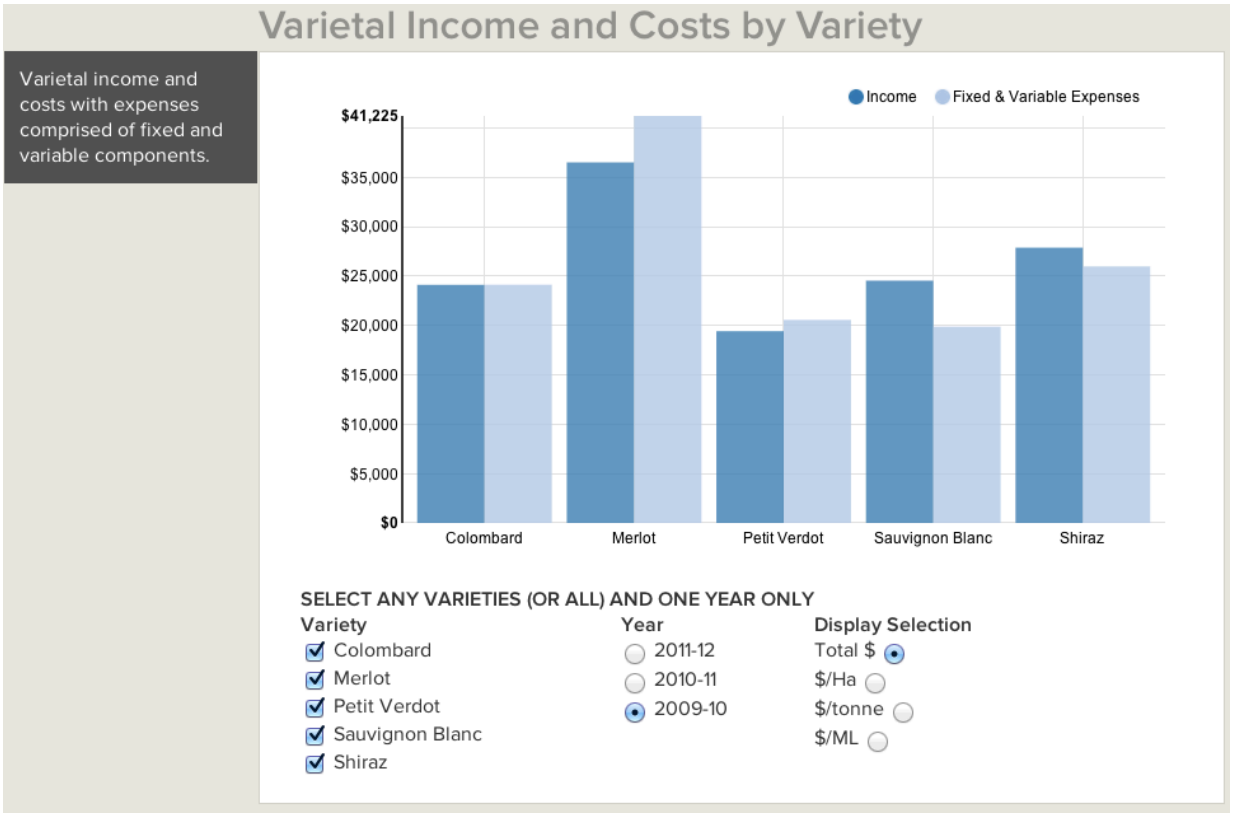


Varietal income and Costs by variety (3a)

This graph enables profitability comparisons for a group of varieties selected in any single year. The output can be displayed as a total income/cost, income/cost per hectare, income/cost per tonne or income/cost per mega litre. Of course a display in total income/cost does not account for different patch sizes and is more useful if looking a total budget for say cash flow purposes.

From this graph you may assess the most profitable varieties in any year, then break this down on a per patch basis to ensure all patches in that variety have good performance.

In your analysis of profitability a focus on the most and least profitable varieties is essential. While you will have a "gut feel' for this result, usually from price by yield, if you have spent time more accurately reflecting on the different inputs per variety, sprays, fertiliser, irrigation you will get an accurate picture of profitability with some of the production sensitivity by variety accounted for.



Varietal income and Costs by year (3b)

This graph is similar the one above but allow multi year comparison for a single variety. Multiple years are selectable but only one variety.

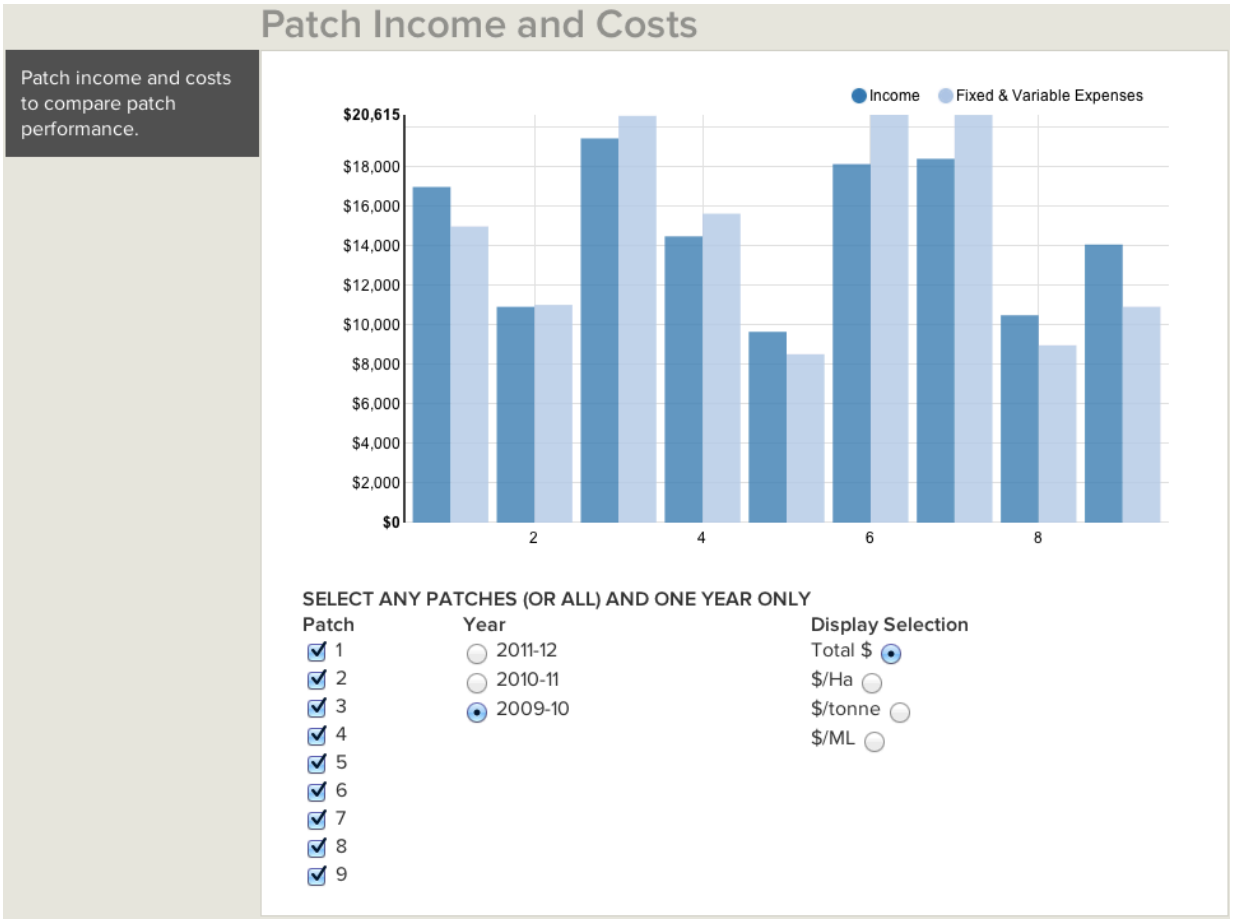
Performance of a variety may have been good in the most recent year, but assessment of previous performance may assist in determining the improvement or deterioration of profitability and why over a number of years.

Patch Income and Costs (4)

In conjunction with the analysis above the patch performance is the final step in assessing performance of the enterprise. This graph reports on per patch performance illustrating income and all costs by patch for a particular year. Patches and year is selectable. Reporting can occur in several formats including total costs per patch, per tonne, per hectare or per mega litre.

Within any variety you should analyse the performance of each patch to reflect how they vary around the average. You can consider the inputs, soil types and frost susceptibility of the patch in relation to its performance. Where profits are still evident you may not make any change, however whenever a loss is incurred particularly over more than one year more serious action may be required.

Be aware that patches with no yield cannot be assessed on a per tonne basis and if you select these patches with others the graphs will be distorted.



Depreciation Calculator (5)

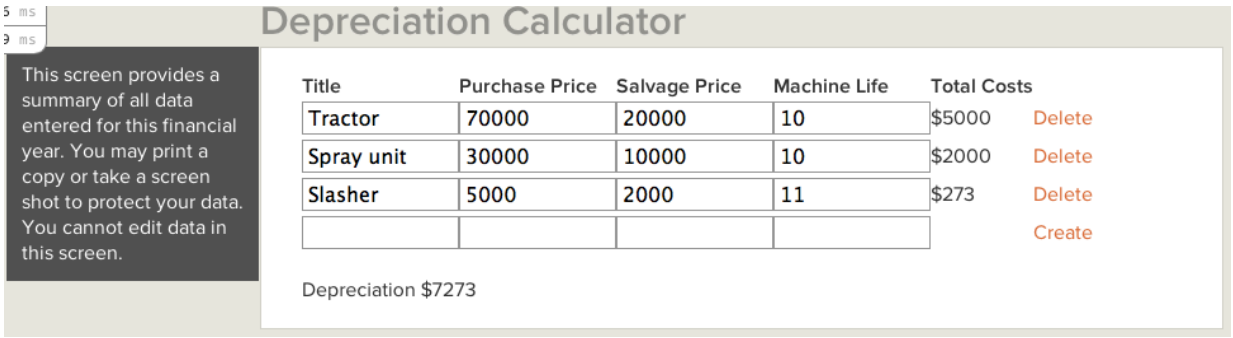
A depreciation calculator is included in Know Your Numbers to enable realistic farm management depreciation to be used. Tax depreciation is distorted as investment incentives, accelerated depreciation, equipment no longer serviceable and machinery that is not to be replaced is included in tax depreciation and rightly so.

Farm Management Depreciation needs to annualise the cost of machinery that is regularly replaced as it is a key input to the business. Such purchases may occur in say five or fifteen year intervals and may be new or used. Minor equipment less than $6500 is not included in part because it can be written down as annual cost as the tax system allows.

It is true that in times of low return businesses may not change this equipment as regularly as a depreciation schedule may indicate as cash flow is not available to do so. To not allow for this important cost in your profitability assessment in some way is to make profits higher than they really are.

In some cases a business may have leased some or all of their equipment and this effectively puts an annual cost on the ownership, therefore that plant would not be included in a depreciation schedule.

The depreciation schedule enables many machines to be added, or deleted and the final number from this report needs to be manually added to the Fixed Cost page of Know Your Numbers.



Backup

As with any computer system backing up and protecting your data is important. While the server used to store this information is secure and frequently backed up you should print off a copy of your SUMMARY sheet for each year as they are complete. A copy ot the tabular report is also worth printing for you records.

If you change any information in the system, it is not possible to retrieve previous versions.