

FARMWORKS

DESIGN SERVICES – SUBDIVISION, FARM CONVERSION, IRRIGATION LAYOUT



AN EXISTING PROPERTY MAY BENEFIT FROM A WELL THOUGHT OUT REDESIGN PROGRAMME. SUBDIVISION OR BUYING A NEIGHBOURING PROPERTY WILL SIGNIFICANTLY ALTER THE FARMS DYNAMICS. CAREFUL LAYOUT OF PADDOCKS AND SIZING, WATER SYSTEMS AND CENTRAL RACEWAYS CAN MAKE MORE EFFECTIVE USE OF LAND PRODUCTIVITY.

Uniformity of paddock sizes can eliminate feed residue or shortfall in a rotational grazing programme. Correct location of raceways to the central dairy shed can be customised around the new paddock layout helping to eliminate lameness problems, and correct siting of water troughs will make the most efficient use of expensive water pumping systems. Dairy Conversions are currently one of the most common uses of the FARMWORKS Design Service.

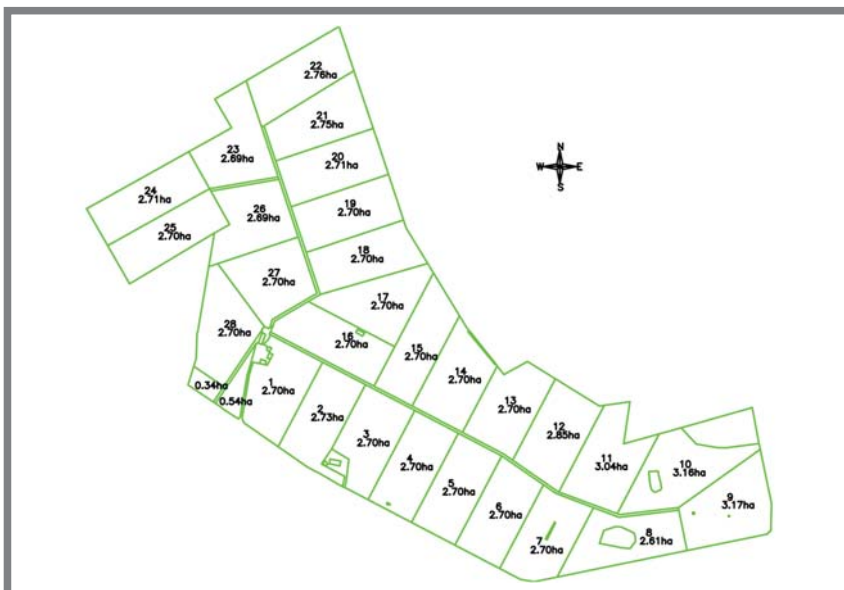
In addition initiatives around 'clean streams' and the requirement to fence off waterways and swamp areas are prompting farmers to review their farm design and location of fence lines. Many farmers are therefore taking the opportunity to look at a long term farm design that not only considers production and environmental goals but also farm aesthetics.

BENEFITS OF FARMWORKS DESIGN SERVICE

- Subdivisions with uniform paddock areas limit feed residue or shortfall in rotational grazing programmes.
- Minimise lameness through optimal race placement and dairy shed location.
- Budget down to the last electric fence insulator, drainage connector or the final staple in a fence line.
- Locate Centre Pivot Irrigation systems to ensure water cover to the entire productive area and one that won't run over fences, gates and buildings.
- Optimise location of fences from waterways and swamps to ensure environmental compliance and retention of maximum allowable productive areas.
- Design paddock layout and fences around soil types and terrain to more effectively manage livestock grazing and cropping rotations through the different seasons.
- Improve farm aesthetics.

OPERATION OF THE SERVICE

Good planning is essential. Before a farm design can begin some crucial on property information must be obtained. Typically a design brief should include the following:

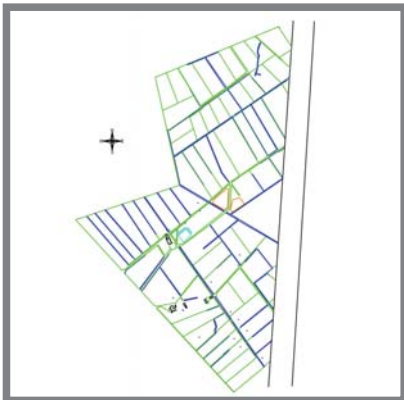


A MAP OF A NEW FARM DESIGN SHOWING PADDOCK UNIFORMITY

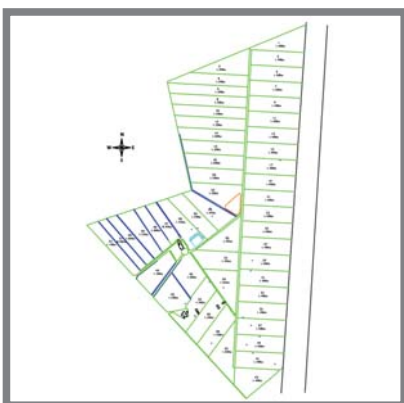
- Reasons / background for requiring a new design. Relevant farm details – topography, waterways, native woodlots
- Objectives / desired result from implementation of the new design
- Time Frame

Once the design brief is agreed a FARMWORKS GPS Technician will make arrangements to visit your farm. Our Technician will record by GPS all the relevant farm details working with the farmer to evaluate which existing features will stay, eg. dairy shed, farm buildings, machinery sheds, fencelines

The designers at FARMWORKS will then draw up a new farm design, based on the Design Brief, which will be presented to the farmer for final discussion and signoff.



BEFORE THE FARM REDESIGN



AFTER THE FARM REDESIGN

LAYING OUT THE DESIGN

Upon completion of the design, locating the new farm layout points can be done by following the measurements supplied. These include distances and bearings for all new details. However the most common and accurate method (recommended) is to have the FARMWORKS Technician return to the farm, and locate all the new location points with specialist GPS equipment. The type of GPS system used to locate these key features is accurate down to 2-3cms. This is what we refer to as 'Pegout' work.

Pegout refers to a process where specialist GPS RTK equipment is utilised to take the designed layout from the computer to accurate placement in the field. Utilising a portable GPS Base Station the two GPS units link together by radio, the system can determine points down to 2-3cm accuracy. Pegs or standards are used to mark the positions of fence strainers or drains. This allows fencers and pipelayers to work to pinpoint accuracy.



NEW FARM TRACK BASED ON FARM DESIGN



CENTRE PIVOT IRRIGATION SYSTEM LAYOUT REQUIRES PIN POINT ACCURACY

Similarly with Centre Pivot Irrigation system layout, pegout is an essential component in the process. Pegout ensures correct location of the centre pivots so that the wheel spans have clearance from buildings and trees.

Using the pegout process significantly reduces the time required to measure out by hand and calculate accurate angles manually.

LEVERAGE YOU INVESTMENT IN A NEW FARMWORKS FARM DESIGN

Have your farm design laser engraved onto a FARMWORKS Communication Whiteboard and copied onto a Map Pad for the ultimate staff communication tool set.

Import your new map file into FARMWORKS P-Plus Farm Management Software. Use the software to monitor paddock records, update your map and track stock movements.

NEED TO KNOW MORE? CONTACT:

FARMWORKS PRECISION FARMING SYSTEMS LTD
 8 MANCHESTER SQUARE, PO BOX 433 FEILDING , NEW ZEALAND
 T 64-6 323-9059 F 64-6 323-1371
 E INFO@FARMWORKSPFS.CO.NZ
 W WWW.FARMWORKSPFS.COM

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