DeLaval VMS[™] V300

A System Approach

IT ALL REVOLVES AROUND YOU

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IT ALL REVOLVES AROUND YOU

DeLaval VMS[™] V300 is all about making dairy farming more personal. More accurate. More profitable.

It is a system that allows us to treat each farm, each farmer, each cow, even each teat – individually – and to customise the process to meet each individual's needs, to create a better place to be for workers, cows, you and your families.

Taking a system approach – with you at the centre of everything we do.

A dairy farm is a complex business. It requires systems that do complex things as simply as possible. Systems that manage the interactions between different processes and inputs with one objective in mind – more, better quality milk from healthier cows, without making it impossible for you to have a healthy lifestyle.

To do this it is essential to take a whole-farm approach, and with 135 years experience and more dairy innovations under our belt, it's what we do better than anyone else. We know and love dairy farming; it's all we do.

The VMS V300 uses automation to make you less reliant on an uncertain future labour market, to keep you at the forefront of animal welfare and food safety issues, and to help ensure that dairy farming is a profitable option now, and an appealing lifestyle and career choice for the next generation.



VMS V300 is not about technology – it's about dairy farming, and it's about you.



Animal Welfare

As a pure Voluntary Milking System, the VMS V300 is not a conveyer belt that treats cows like products, it is a fully automated milking system that generates better results for you and your animals.

Farm Profitability

Generate more milk, more efficiently, more safely and more sustainably, in a way that also meets the consumer pressures that farmers the world over are facing today.

TAKINGA 360 O VIEW OF YOUR FARM



Work Efficiency

The VMS V300 is all about creating a better work environment and lifestyle for you and anyone who works on your farm.

Food Safety

Every day, every milking, every cow; your VMS V300 will ensure that you are at the forefront of food safety into the future.





WHY IS IT BETTER?

DeLaval VMS[™] V300 allows each cow to be milked according to her individual needs and capacity. This means that each cow is able to reach her full potential. C. DeLaval

Pre-defined service costs

More than **3500**kg

milk per day

Fewer labour hours hit rate

Teatspray

REAL Quarter Milking

No tank milk wasted

6



99.8%



*Data collected on test farms and pilot farms. Data compared to DeLaval VMS[™] Classic. Results may vary and are not guaranteed.

THE KEY FEATURES

DeLaval VMS[™] V300 harnesses and applies technologies that weren't previously available, to do things that were never possible on a dairy farm, at any time in history.

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DeLaval DelPro[™]

Our most advanced milking system requires the most advanced farm management software.









DeLaval InControl[™]

A seamless user experience keeping you connected to your system wherever you are.

DeLaval PureFlow[™]

A totally separate cup delivers the ultimate teat preparation.



DeLaval InSight[™]

Our most advanced camera and software combination delivers the fastest, smoothest process.

DeLaval Advisory

Start the way you mean to continue with help where you need it.



DeLaval InService[™] **All-Inclusive**

You may never think about service the same way again.

DeLaval **DelPro**^m

In the 135 years we have been building dairy systems we have learned that to get the best result, you have to focus on the whole farm. And because we still run the original farm next door to our head office, we are reminded of that fact every day.

That's why, for us, it isn't enough that the new DeLaval VMS[™]V300 is the best of breed milking system. It is essential that it is capable of forming the central hub for your entire farm, and that's where DeLaval DelPro[™] comes to the fore.



Bertormance DeLaval VMS[®]V300



ICAR approved Quarter Milk Meters

Activity Monitoring

Online Cell Counter OCC

Smart Selection Gate Grazing Gate

DelPro[™] Reproductio Decisions start here.

Health

CE Milking

Feedin

At the heart of every DeLaval solution is our farm management system – DelPro. It is what turns all the data collected by your VMS V300 and any other sensors, into useful, easily understood information to let you make better, faster, more accurate decisions. Whether you have one or 64 VMS V300 on your farm, you set your management objectives, implement a plan and DelPro will make sure you have everything you need to put the plan into action.



Herd Navigator



System thinking

DeLaval **InControl**[™]

DeLaval InControl[™] doesn't just make it easier to control and monitor your DeLaval VMS[™] V300; it will provide you with simple visual reports, analysis and information to help you to make better decisions. DeLaval InControl™ means you can call up the performance of a cow, see throughput statistics or change the settings of your system.

Best of all, it delivers all this functionality to you, wherever you want it. Using either the touchscreen or a mobile device, you are always able to view your VMS V300, to control its operation, track daily routines, update individual cow data or share information with staff.

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5445

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4.7 % 10+26+

You're InControl



View cameras

DeLaval InControl also makes it possible to plug in extra cameras and sort gates so that you have one central point to view and control your operation.

Quickly and easily view

- Cow queue to VMS V300
- Individual cow status and performance data
- Find my cow in the barn or pasture
- Recently milked cow info
- Activity monitoring information
- Somatic cell count information
- Fine-tune individual cow settings
- Reproduction information

Share information

Easy to use

- Large buttons
- Simple icons
- Intuitive layout

Mobile version

• For Android and iOS

DeLaval PureFlow[™]

If you are looking for our very best milking process then look no further than DeLaval VMS[™] V300 – after all, milking is its middle name.

It all starts with preparation - DeLaval PureFlow[™] doesn't just clean udders, it prepares them. Using the exclusive transparent cup that allows you to see it in action, each teat is individually cleaned and stimulated to improve letdown and productivity.

Add to this the separation of pre-milk, which is removed to a waste container via a separate line, and fully adjustable settings including the ability to add soap for enhanced cleaning, and you have the ultimate preparation.

Once milking is complete, the DeLaval PureFlow[™] cup is fully flushed and cleaned as part of the comprehensive cleaning routine that is automatically carried out by the VMS V300.

The start of the most gentle and effective milking process we've ever created.



Separate cup

Transparent cup

Stimulation

Adjustable settings

Separate lines and containers

DeLaval InSight[™]

When you observe a DeLaval VMS[™] V300 in operation there are two things that strike you immediately. How calm the cows are, and how gently and smoothly the robotic arms go about the repetitive tasks of cleaning, preparing, treating, attaching and spraying.

The key technology that makes this possible is DeLaval InSight™

What you see is a smoother, faster, more accurate arm than we've ever created. An arm that makes attachment, preparation, milking, teat-spraying and cleaning all much faster, more accurate and more efficient. But what is driving these performance improvements is the interplay of the most sophisticated camera, hardware and software ever seen in a milking environment. **99.8%** Attachment rate

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Self learning

Most advanced software

Self cleaning

Two nozzles for sprays

Scratch resistant lens

*Data collected on test farms and pilot farms. Data compared to DeLaval VMS[™] Classic. Results may vary and are not guaranteed.

Easily serviced

Robust design

Smoother and faster

It doesn't just react to the udder. It learns.

At each and every milking DeLaval InSight[™] maps and sees each cow's udder and teat placement. This means that even if a cow has never been milked by a robotic milking system, the VMS V300 can still milk it efficiently. You won't need to spend time teaching the teat positions the first time a cow comes through.

It also means that InSight anticipates unique udder configurations and adjusts each time a cow comes in, making it possible to carry out each milking step more efficiently.

DeLaval **Advisory**

Moving to a Voluntary Milking System is, for many farmers, an excellent way to generate more milk, more efficiently, more safely and more sustainably, in a way that also meets the consumer pressures that dairy farmers face today.

Our advisory and planning teams are available to help you assess the suitability of a Voluntary Milking System for your situation, and to help you figure out if a DeLaval VMS[™] V300 will deliver you a better bottom line.

> **Training and** routines

Total system approach



We take a 360° view of your farm

Fertility management

> Standard Operating **Procedures**

Feed Management

Energy savings per kg milk

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Performance optimisation

Get the most out of DelPro

System integration sensors and customisation

> **Barn planning** conversion or new build

Milk cooling transport and storage

DeLaval InService[™] All-Inclusive

With an InService[™] All-Inclusive agreement in place, for one agreed price, you can be rest assured that every part of your system from scheduled servicing to routine maintenance, detergents to liners, vacuum settings to lubricants, cleaning, advice and everything in between; is working in harmony to deliver more, better quality milk.

It's all included

With a DeLaval InService[™] All-Inclusive agreement in place we will deliver Service and Consumables for a fixed price, leaving you to get on with the business of dairy farming secure in the knowledge that every time the cups go on, your system is performing to expectations.

Service and maintenance are included

Because DeLaval VMS[™] V300 works 24/7, like any hard working system it needs to be serviced at regular intervals for pre-determined actions, with InService[™] All-Inclusive, we will make sure these are performed on schedule.

Results are included

High somatic cell count (SCC) will significantly decrease milk production. As part of your InService[™] All-Inclusive agreement we will make sure that you get the most out of the VMS V300 teat-spraying functions by matching the right teat sprays to your situation.

Certainty is included

The bigger the operation you have, the more complex it is to keep track of your production costs. With InService[™] All-Inclusive we can eliminate that complexity, we will agree up-front to a consistent cost per month, per quarter or whatever you prefer.



Keeping you milking at the Blue Line

With DeLaval InService[™] All-Inclusive we will carry out routine maintenance, scheduled servicing and the replenishment of consumables; all for one agreed price and with a payment structure that works for you.

Consumables are included

It's not just the labour hours that are included in your InService[™] All-Inclusive agreement. We will also make sure that you do not run out of detergent, teat spray, milk filters or oil.

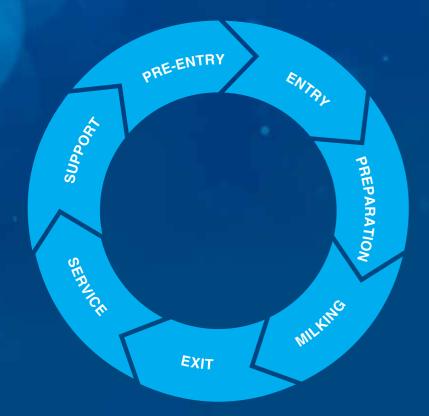
Performance is included

When it comes to the effect of combining service and consumables on performance, it is truly a case of 1+1=3. We will make sure that you are milking with the right liners and correct vacuum and pulsation settings for your herd. We will also ensure your cleaning routines, temperatures and dosing are delivering the best quality milk.

Milk Quality is included

You can be sure that your detergents, liners, cleaning routines and pulsation settings are operating in total harmony to deliver you the Milk Quality you demand.





PUTTING TALL TOGETHER

The DeLaval VMS[™] Milking System V300 is so much more than just a milking robot. It is at the centre of a whole new way of dairy farming that when implemented well, ensures optimal results at each and every step.

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PRE-ENTRY

Milking is only one aspect of dairy farming. It is where you see the results of your hard work, but those results are generated in the barn, on pasture, or however you choose to feed and care for your animals.

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There are three major parts to the pre-milking stage of a **Voluntary Milking System:**







TAKING A 360° VIEW



Animal Welfare

Treats each cow as an individual, ensuring optimal health outcomes.



Farm Profitability

More time on feed with more time to rest will create more milk for a lifetime increase in milk production.



Work Efficiency

Less time milking and sorting cows means more time on profitable tasks.



People/Task Management

Focus on the health and productivity of your animals, with consistent, easily understood routines and standard operating procedures.



Cow Management

Free cow traffic, milk first or feed first, partial or total mixed rations, pasture or some combination that works for you - if it works for your cows, it works with DeLaval VMS[™] V300



Profit Management

With the ability to control everything from your mobile, touch screen or PC, you can easily view the cow queue to find the cows that are eligible for milking, as well as managing the interactions between different processes to make it easier for you to get the most out of your dairy farm.



ENTRY

If you want the cows to do some of the work you would normally have to do yourself, like fetching and sorting, it is important that the entry phase is designed with the cow in mind.



DeLaval VMS[™] V300 treats each cow as an individual

Each cow is identified on entry and the length of the bail is automatically adjusted to suit her needs. The width can also be adjusted at installation to allow for your herd's breed and size profile. Using the identification, VMS V300 deploys the most sophisticated permission system ever created.





Animal Welfare

Permission system creates a virtuous circle of improved productivity, fertility and longevity.



Farm Profitability

Assess each cow in real-time to permit another milking, or to send her back to the feed table.



Work Efficiency

Track daily routines, create reports, view real-time data, call up the performance of a cow and see throughput statistics.

Milking only starts if it's beneficial

VMS V300 doesn't just milk every cow, regardless of the economic value. It calculates permission based on a combination of her yield and the time since her last milking.

This means it only milks those cows for which another milking will be beneficial. This delivers a better yield than any other system, as well as better udder health.

For some this may mean a 4th milking at 3am, for others in the same cohort, only twice in the same day.

If she is given permission to be milked, she is delivered a customised supplement feed mix, if not - no concentrate is given and she is exited seamlessly from the VMS V300 so that the next cow can enter.



PREPARATION

It starts with pre-spray, with two nozzles that can be programmed depending on your preferences or seasonal requirements, the DeLaval VMS[™] V300 delivers pre and post spray – targeted not at the whole udder with the coverage errors and waste associated, but at each teat with incredible accuracy ensuring a better result.



Working with nature

When a cow enters the VMS V300 she will have a small amount of milk already in her udder and teat cisterns ready for evacuation. This will be about 45 seconds worth of milk. The true flow of milk however, will not begin unless Oxytocin has been released and is squeezing the cow's alveoli.

To ensure consistent milk flow by stimulating Oxytocin release, VMS V300 doesn't just clean the teat, it prepares it for milking by using a combination of teat spray for disinfection and the DeLaval PureFlow[™] cup for proper cleaning. It stimulates oxytocin release and facilitates milk ejection before vacuum is applied to teats by means of a combination of water (or cleaning solution if desired) and air.

This results in a superior flow pattern and less time with cups on, which is great for udder health.



TAKING A 360° VIEW



Animal Welfare

Delivering Oxytocin based letdown due to a focus on each teat.



Farm Profitability

Flexibility to milk a wider range of udders means less culling of productive animals.



Work Efficiency

As well as working with all udder types, it is also safe, easy, fast and comfortable for you to manually milk with no disruption.



Food Safety

No cross contamination and reduced mastitis for the remainder of your herd.

So important it demands a separate cup

The VMS V300 uses a separate, dedicated cup to eliminate any chance of cross-contamination or residue during the preparation stage. Once attached, the DeLaval PureFlow[™] cup uses a unique combination of air, water and optional DeLaval PureFlow[™] cup cleaning additive to clean, stimulate and strip the teat ready for milking. During this process pre-milk is collected, transported and dumped for each cow, again using separate lines and containers to ensure there is no risk of cross contamination.

Now the teat is dried and is ready for milking to commence, with the clock already ticking on full Oxytocin based letdown.



MILKING

Productive cows are important to profitability, regardless of their udder size, or teat height, shape or location. Our teat-friendly process lowers culling rates and provides consistently high milking capacity results.



TAKING A 360° VIEW



Animal Welfare

Gentler on udders and a less stressful process is better for your cows.



Farm Profitability

Works with a wider range of cows and udders, and with simple manual milking reduces culling of productive cows, increasing lifetime milk production.



Work Efficiency

Without teaching, VMS V300 does the timeconsuming, repetitive tasks of milking, forming a central point to manage routines and people.



Food Safety

Pulsation and vacuum levels maximise flow, and minimise free fatty acids, milk residue and carry over.

REAL Quarter Milking

DeLaval VMS[™] V300 delivers the best milking performance because only VMS V300 can deliver REAL Quarter Milking.

With a dedicated ICAR approved milk meter for each teat, VMS V300 has taken milking to a new level, delivering incredible gains for animal welfare and productivity.

Using current data, historical information and modeling, VMS V300 is able to automatically adjust pulsation settings to get the best result with the least discomfort for each cow.



During milking you can observe milk flow, yield, blood and conductivity and milking interval as well as other key production data; all per quarter, and all compared to last milking.



With shorter tubes and a superior vacuum system VMS V300 provides better vacuum stability, which leads to better comfort, milk transfer and fewer slips or kickoffs.The shorter tubes also reduce maintenance costs.

Smart Pulsation

VMS V300 constantly measures each cow's milking performance and adjusts the pulsation ratio accordingly to milk her. The result: faster and less stressful milking, which allows for more milkings per day and shorter waiting times for cows.



The advanced modeling, combined with the real time flow data from the 4 ICAR approved milk meters makes it possible for VMS V300 to detach at the right time, in the right way to protect the sensitive and valuable teats.



EXIT

Like preparation, it's about spending more time now, to save time and money later.

The sophistication and accuracy of the DeLaval InSight[™] means we can now spray each individual teat precisely from a dedicated nozzle. This obviously saves on spray, but more importantly it provides better teat coverage, and therefore better health and productivity outcomes.



TAKING A 360° VIEW



Animal Welfare

A two nozzle system which allows different chemicals to be used for pre and post milking cleaning.



Farm Profitability A targeted teat spray results in a reduction in teat spray consumption.



Food Safety

Milk only released at exit following analysis of Mastitis Detection index (MDi), blood and conductivity.

*Data collected on test farms and pilot farms. Data compared to DeLaval VMS[™] Classic. Results may vary and are not guaranteed.







Because cows are exiting 24 hours a day, it is critical that your VMS V300 is able to get cows back to feed and water automatically. It is also able to draft cows according to your requirements. For instance you can draft on DeLaval Mastitis Detection index (MDi), colour, conductivity or if milking was incomplete.

The MDi provides early indication of cow ill health. The tool analyses several parameters to avoid udder health issues and mastitis. VMS V300 calculates the MDi for every cow, at every milking and uses the data to help you ensure better health outcomes.

As with the entry, DeLaval VMS[™] V300 uses a more natural curved exit. The unique layout also means that the entry gate encourages the exiting cow to move. For difficult cows an additional Exit Motivator can be added to your VMS V300.

And because the exit doesn't force cows out in a straight line, you don't need to build in extra room to allow them to turn, meaning you can create a more comfortable, faster exit process with less space.

What happens to the VMS V300?

- The VMS V300 will also clean itself to prepare for the next cow. The Auto-Clean process after each milking includes:
- · Full flush of DeLaval PureFlow[™] cup (outside/inside)
- · Full flush of teat cups and hoses (outside/inside)
- · DeLaval InSight[™] camera cleaning using water, soap and sponge · Deck flush

There is also the option of including full disinfection of the four milking cups and the DeLaval PureFlow[™] cup, and a full spray of the EndEffector.

What happens to the milk?

At the conclusion of milking the milk is held by the VMS V300 awaiting analysis of the milk to be completed. This means that milk can be diverted based on colour, conductivity or MDi.

You set the parameters and milk will automatically be diverted to one of five destinations. This means you can separate colostrum, dump, tank and two more (e.g. fresh, A2)

What happens to the cow?



SERVICE

With the largest global dealer and service partner network, and the ability to integrate any number of DeLaval products and services into your DeLaval VMS[™] V300 farm, you can rest assured that your VMS V300 solution is not only supported by the best team in the business but is also able to be scaled or configured to meet your farm's challenges.



Ensuring your VMS V300 is delivering optimal results

Your new VMS V300 is going to operate about 8,000 hours per year. And like all other modern, hard working machines it needs to be regularly serviced. Preventive maintenance is done according to a service program with three Service visits per year. Our certified VMS V300 Service technicians are well trained on VMS V300 and they use Original Service kits and professional tools when they are testing the installation.

In case of emergency it is easy to reach our remote Support 24/7, throughout the whole year. You will talk to professional people that can help and you will be up and running again efficiently.

TAKING A 360° VIEW



Animal Welfare

Pulsation, vacuum and liners working in harmony with your cows.



Farm Profitability

Service and Consumables at a fixed price, for easier budgeting and peace of mind.



Work Efficiency

Avoid unnecessary breakdowns and performance loss with timely servicing.



Food Safety

Cleaning performance and quality detergents to ensure good milk quality.

DeLaval VMS[™] V300 never stands alone. Neither will you.



SUPPORT

DeLaval has built more dairy solutions than anyone else on the planet. Not only that, it's all we do.

That experience, and 100% focus on dairy is your guarantee that if you choose DeLaval VMS[™] V300 you don't just get a robot – you get a total, integrated dairy system. A farming system focused on:



TAKING A 360° VIEW



Animal Welfare

Improved udder and hoof health, increased longevity and fertility.



Farm Profitability

Ensuring that dairy farming is a profitable option now, and an appealing lifestyle and career choice for the next generation.



Work Efficiency

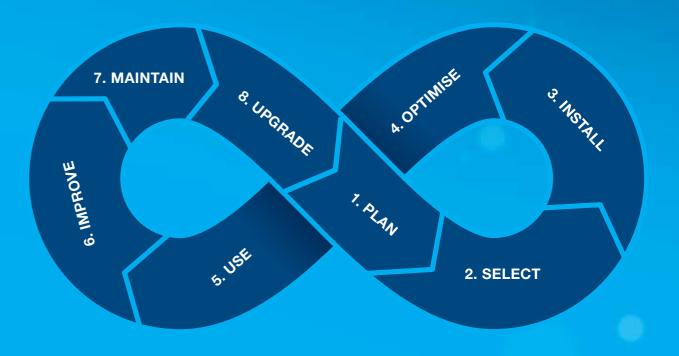
Routines, training and standard operating procedures to get the most out of your labour hours.



Food Safety

Every day, every milking, every cow; your VMS V300 will ensure that you are at the forefront of food safety into the future.

With you on every step of your VMS V300 journey.



1. PLAN	You don't plan a new dairy s a system that will work for y
2. SELECT	Because VMS V300 is able t specifying the perfect system
3. INSTALL	Our professional team will had certified and operating quick
4. OPTIMISE	It's not a matter of plugging process of getting you up ar
5. USE	With routines and standard of available we will help you ge
6. IMPROVE	Easily upgradeable, your VM improvements. Access to th
7. MAINTAIN	Easily and quickly serviced, maintained to ensure a lifetir
8. UPGRADE	One advantage of VMS V30 growth, including options su

system every day – but we do. Let us help you plan you, the way you want to work.

to be customised, and other useful components integrated, em for you is something we can help you navigate.

have your VMS V300 installed, commissioned, ckly and efficiently.

g your VMS V300 in and leaving you to it. The and running is the key to a successful installation.

operating procedures as well as expert advice always let the most out of your VMS V300 every day.

MS V300 will become a hub for ongoing system hese recommendations is an integral part of VMS V300.

, we will make sure that your VMS V300 is ime of performance.

One advantage of VMS V300 is that it is easy to add additional units to meet growth, including options such as SCC & progesterone testing or even a Body Condition scoring camera to meet your farms needs.

Get even more out of your voluntary milking system with DeLaval.



Farm Planning

Cow traffic is essential to a profitable voluntary milking system. Our team of trained experts will help you design a solution tailored to your needs.



DeLaval Clover Liner[™]

With its clover-shaped concave walls, the unique patent-pending DeLaval Clover[™] Liner provides optimal performance, advanced massage properties and gentle teat treatment.



DeLaval Herd Navigator™

Instantly receive accurate analysis from every cow to improve your farm's profitability, work efficiency and animal welfare.



DeLaval OptiFeeding™

Regular frequent delivery of specific feed rations is essential for dairy farming success. Using automatic feeding systems to optimise feed management is a profitable investment.



DeLaval OptiDuo™

To increase feed consumption don't just push feed around – refresh and remix it. OptiDuo is a fully automated solution.



DeLaval OptiFeeder™

DeLaval Out of Parlour feeders are designed for the comfort of both farmers and cows.With Strong open design cows have easy access to accurately dispensed food.





DeLaval Body Condition Score BCS Camera

Body condition scoring is essential to boost productivity, fertility and longevity – with a BCS camera you will accurately record every cow, every milking.



Smart Selection Gate/Grazing Gate

Whether you operate a pasture based system, a barn, or a mixture of the two; the addition of a DeLaval Smart Selection Gate will optimise feed access and reduce the time spent fetching cows.



Cow Comfort

Our cow comfort approach takes into account the entire needs of the cow around the clock to ensure that your herd gets the best possible treatment and stays healthy, strong and productive.



Consumables

A full range of consumables designed and tested to ensure maximum performance from your DeLaval VMS[™] V300.

HOW CAN WE HELP?

Dairy farming is a business, and like all businesses there are pressures to produce more with less. But dairy farming is also a way of life, and how you want to farm is an important part of the decisions dairy farmers are making every day.

We don't believe that the DeLaval VMS[™] V300 is the right system for every farmer. Your history, your personality, the unique economic and environmental factors that you face will determine the best solution for you.

That is why if you are looking to farm with a voluntary system it is essential that you chose a partner who can help you take a 360° view of your whole operation.

A partner who has experience of every aspect of dairy farming.

A partner who can help you with how each variable element in your farm system will impact the others, and what their combined impact will be on your key objectives.

A partner who will help you create a system, that truly revolves around you.

THE NEXT STEP

To take the next step on your personal VMS V300 journey, either talk to your trusted DeLaval representative or for more information,

visit us at www.delaval.com

IT ALL REVOLVES AROUND YOU



delaval.com

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