

# OPERATOR

November 2019 Edition



## Inside

|   |    |
|---|----|
| From the MD's Desk .....                | 2  |
| Profile of a Member .....               | 3  |
| Cultural Experience.....                | 4  |
| Diversity & Inclusion - TasWater .....  | 5  |
| 2019 NODP.....                          | 5  |
| 82nd Victorian Conference Report.....   | 6  |
| Second South Australian Conference..... | 8  |
| Tasmanian Operators of the Year.....    | 9  |
| Victorian Operators of the Year .....   | 10 |
| Taste Tests.....                        | 12 |
| Birds Eye View - Swan Reach WTP.....    | 14 |
| FNQ Charity Day .....                   | 16 |
| Ringarooma Interest Day .....           | 18 |
| Hydro Reuse .....                       | 19 |
| Queensland Water Directorate Forum..    | 20 |
| Bowls Day Victoria .....                | 21 |
| Queensland Interest Day .....           | 22 |
| Operator Competency Project .....       | 23 |
| Corporate Member News .....             | 25 |



Craig Piazza scooped the pool in Bendigo for his paper. More on Page 6.

Paul Beard from Water Corporation in WA, 2019 Kwayte award winner. More on Page 8.



Ben Tscharke at the FNQ Charity Bowls day. More on Page 16.

Newsletter of the WATER INDUSTRY OPERATORS ASSOCIATION OF AUSTRALIA

## FROM THE MD'S DESK

Welcome to the fourth and final edition of Operator for 2019. As this edition goes to press, much of NSW and Queensland is not only drought declared, but is now also experiencing some of the worst fire conditions on record. We are aware that many of our Members have been doing it tough for quite a while. We want you to know that our thoughts and best wishes are with you. We hope the communities in these high-risk areas stay safe and we praise the effort of the emergency assistance providers and volunteers helping during this time of crisis. Remember, if you need some help to operate a plant, or if you just need someone to have a chat with, please reach out to us. We have many Members who would happily lend a hand if needed.

With 2019 drawing to a close, the various State based Advisory Committees have been staging their final meetings for the year. On the agenda at each meeting is the election of the Chair for 2020. We are pleased to announce new Chairs in two States, with Stephen Westgate taking over in Tasmania and Alan Butler in New South Wales. We express our sincere thanks to Lindsay Walsh from Mid Coast Council who has decided to step aside as Chair in NSW after admirably undertaking the role since 2013.

There are a number of Interest Days just completed or planned for early in the New Year and each Advisory Committee is currently working on a program of events for 2020. It is really important that Members get behind the State based Advisory Committees and support these events whenever you can.

I was privileged to represent WIOA at the Water New Zealand Conference in September. I listened to some outstanding speakers at the conference and it was great to catch up with existing colleagues and to meet a number of new people as well. One of the recurring themes in presentations and discussions is the imminent structural changes to the industry following on from the recommendations from the Havelock North inquiry. There is a lot of work being undertaken in the competency space in particular, and it appears that mandatory operator certification may not be far away.

In September, we updated and signed the MOU with our NZ Operations cousins from the Water Industry Operations Group NZ. The MOU covers the next three years and includes several initiatives designed to benefit members from both organisations.

WIOA staff have been busily working for the past few months, on the development of our new Certification and Membership platform and database. It is coming together very well. We have been able to start loading all the actual data into the system and have commenced testing everything to iron out any bugs. We hope to be able to launch the system early in the New Year. We believe that the online certification platform will allow us to deliver a user friendly system for recording of all the certification data and streamlining the application and renewal process.

There have been changes in the national Water Industry Reference Committee (IRC) following the recent retirement of John Harris. At the August IRC meeting, I was elected to the position of Chair, and current WIOA Victorian Advisory Committee Chair, Anthony Evans has also been elected to the IRC as one of the two industry experts. There has been a lot of work completed recently with the update to the Certificate

II and III qualifications and all the units of competence. We are awaiting final sign off from the Australian Industry Skills Committee and anticipate that training providers will be able to access and use the new material from early 2020. Work has now moved to the update of Certificate IV.

Since the last Operator went out, we have staged our last three major events for the year and all were successful in their own right. The South Australian Conference was held at the brand new Murray Bridge Race Club facility in August. In September, we staged our biggest annual event, the Victorian Water Industry Conference and Exhibition in Bendigo. The attendance was again strong with a total of 1,368 people participating over the two days. All 203 exhibition sites were sold-out in around two hours and there were many companies on a waiting list who unfortunately missed out. The Water Industry Safety Event was held again in Melbourne in October with fabulous support from Hosts in Melbourne Water. There is a complete wrap up on all three conferences, including all the very deserving award winners, later in this edition.

The 2020 conference venues have been finalised. The NSW event will be held in Tamworth from 31 March to 2 April. The Queensland conference will be held in Toowoomba from 2-4 June, the Victorian event will be in Bendigo from 1-3 September, and the WIOA South Australian Conference will be in Murray Bridge from 5-6 August. To make all these conferences successful requires input from you - our members. Don't wait until the last minute. Start putting together the potential topics for a platform or poster paper abstract now. We will accept abstracts for any of these conferences at any time.

After determining the Victorian Best Tasting Tap Water winner at the Bendigo conference (congratulations Barwon Water), the taste test program culminated at the Ixom Best Tasting Tap Water in Australia competition in Dunkeld in Victoria in October. Held at the Twin Peaks Festival, more than 200 festival goers sampled each of the State based Taste Test competition winners. Congratulations to Mackay Regional Council and everyone at their WTP for being judged as having the best tasting tap water in Australia for this year. They will go on to represent Australia at the Berkeley Springs International Water Tasting Competition to be held in the USA in early 2020. We hope they will do Australia proud and bring home the gold medal.

WIOA has a long history of raising and donating funds to various charities. The Victorian golf day was replaced by a Bowls Day in October with \$3,000 raised and added to the charity pool for distribution next year. The Far North Queensland Group held the TRILITY Charity Bowls Afternoon on the back of a very successful Interest Day in Cairns. This event has raised \$1500 which has been donated to the Mareeba Shire Council Mayor's Christmas Appeal. The generosity of all the members and the supporting corporate sponsors who participate in any of our charity events is greatly appreciated.

Finally, the Christmas/Holiday period is fast approaching, so to all our members and readers, please have a safe and enjoyable time, and I look forward to meeting as many of you as possible in 2020.

**George Wall** – WIOA Managing Director



## PROFILE OF A MEMBER



**Name:**

Terry Heness

**Position:** Senior Water Supply Operator

**Employer & Location:** Toowoomba Regional Council, Mt Kynoch WTP

**How long have you worked in the water industry and**

**what attracted you to it?**

Been in the water industry for 12 years, 9 years water and 3 years sewage.

**What do you enjoy most about your job?**

Every day provides different challenges, whether it's source water quality, breakdowns or optimisation of processes.

**What are the major challenges in your current role?**

Working with aging infrastructure.

**How long have you been a WIOA member? (and your involvement)**

About 7 years, volunteering for QLD conferences set up and pack up.

**How do you relax?**

Road cycling and mountain biking.

**Where do you live and what's the best thing about it?**

Toowoomba QLD, close to Brisbane, Gold Coast and Sunshine Coast but not too close to be living in the rat race.

**Quick questions**

**Age:** 49

**Nickname:** N/A

**Family Status:** Married

**Pets:** None

**Favourite food:** Asian

**Least favourite food:** Offal

**Favourite TV show:** The West Wing

**Worst TV show:** Home and Away

**Favourite Movie:** The Odd Angry Shot

**Favourite Musical artist/s:** Goanna

**Favourite book:** Lord of the rings

**Favourite team:** North Melbourne (AFL)

**Ambition in life:** To retire early and travel

**Hobbies:** Whatever takes my interest

**Best Trait:** Ask my wife

**Worst Trait:** Ask my wife

**Four people to invite to dinner:** Graham Kennedy, Paul Hogan, Hilary Clinton, Donald Trump

## DEFIBRILLATOR DONATION

Thanks to an extremely generous donation from the team at Southern Divers, a defibrillator has been made available for use at all WIOA events. A number of our staff have been trained in First Aid and the defibrillator is another tool that may just help them to save a life. The defibrillator will be kept at the registration desk along with our First Aid kits. Although we hope we will never have to use it, the knowing that it is available if needed is really important.



WIOA Committee Members Elise O'Keefe and Anthony Evans with Kate Pritchard (C) from Southern Divers.

## SALLY TIES THE KNOT

Congratulations to WIOA Committee Member Sally Taylor who tied the knot with husband Douglas Shepherd on 26 October 2019. We're sure you'll agree they make a stunning couple.

Sally has now changed her name to Sally Shepherd but her phone number and email address remains the same.



Sally and Douglas on their wedding day.



## CULTURAL EXPERIENCE

Each year a group of Kiwi operators representing the Water Industry Operators Group of New Zealand attends the WIOA Victoria conference in Bendigo. As part of the trip, the visitors come over 5 days earlier and do a study tour around various water and wastewater plants. This is generously hosted by WIOA and the various Water Corporations, mostly in Victoria. Our tour group mainly comprises the various award winners from NZ along with some WIOG committee members.



*The Kiwi delegation at the Bright WTP.*

This year's tour was exceptional yet again visiting sites in Melbourne, Seymour, up to Bright, Albury and Wodonga, across to Shepparton, and eventually to Bendigo. We also visited the Hoppers Crossing pump station on the Friday after the conference. Along the way we visited facilities owned by Yarra Valley Water, North East Water, Albury City Council, Goulburn Valley Water and Melbourne Water.

One of the highlights for this year's touring party was a visit to the Wonga Wetlands. This is truly an amazing place where the Albury City Council have come up with a way of managing their treated effluent, or reclaimed water, from the wastewater treatment plant. They have used it to turn a river floodplain into a sustainable and ecologically important wetland that is now home to native wildlife, approximately 176 bird species and ancient river red gum trees.

Also located at Wonga is the Aquatic Environment Education Centre where schools, Universities, and research groups can come along and study the flora and fauna that is thriving there.

We were shown around by John Hawkins, the Albury City Council Wonga Wetlands Coordinator who gave us the history of the site and explained the work that is going on there. He then took us on walkabout around the site. We got to see the hides for non-invasive viewing of the birds, the river red gums, and also the reclaimed water inlet structure.

John also gave us an introduction to the cultural history of the site. He showed us scar trees where the local aboriginals had harvested bark and wood to make canoes and shields over a 100 years ago.

John then took us along a track to where a replica aboriginal camp site had been constructed. Here we were introduced to Darren Wighton. Darren explained to us the history of his people in the region and the cultural importance of the site to his people and their relationship with the water, the land, and their ancestors.



*Darren Wighton explaining indigenous linkages to the site.*

He then welcomed us onto the land with a smoking ceremony, where he brought round a Coolaman with smouldering eucalyptus leaves on it. We were all invited to inhale the smoke while Darren formally welcomed us onto the land.



*The smoking ceremony.*

The introduction to and the interaction with the local aboriginal culture was the highlight of the trip for me. I got to be part of something special as these two gentlemen shared their stories and their history with a bunch of visiting kiwis, and we got to take part in a cultural ceremony.



*Darren playing the didgeridoo.*

I would like to thank the Albury City Council, President Heidi and the WIOA team for giving us the chance to experience some of Australia's cultural diversity.

**Contributed by** Nick Hewer-Hewitt, WIOG Chair



## DIVERSITY & INCLUSION IN TASWATER

In late 2018, TasWater appointed a Diversity and Inclusion Specialist as one of the first steps in TasWater's journey towards creating a more diverse and inclusive workforce.



Since that point, TasWater has made a commitment to provide a safe and inclusive work environment which is supportive of difference and encourages full participation of all employees in contributing to the achievement of business objectives. The goal is that the workforce is reflective of the diversity of customers and the community of Tasmania.



*Ashlee Rieper and Amanda Allen at the TasWater depot.*

With a workforce made up of 75 per cent men and 25 per cent women, TasWater acknowledges that they have a long way to go, but they are working on it. One of the first actions taken was to offer all people leaders the opportunity to participate in Unconscious Bias training. The training not only uncovered bias that they didn't know existed, it created light bulb moments for many leaders. Since the training, leaders in Information Technology and Service Delivery (two very male dominated areas of the business) have put forward business cases to focus recruitment efforts on attracting more women into the business.

Just recently six new Trainee Water Operator roles have been created and TasWater is actively working to create an environment that is supportive of women in service delivery, with extensive learning and development opportunities, a network of mentors and great employee benefits.

TasWater aims to attract great talent to these roles with a strong focus on real opportunities for women in the Water Operator space.

**Contributed by** Sophie Fahey, TasWater

## 2019 NODP

Each year WIOA runs the Victorian Network Operator Development Program (NODP) for future leaders within the Victorian Water Industry. It aims to build the leadership and networking skills of participants, both internally and externally.

I was lucky enough to be accepted for 2019 and going into the program, I didn't know what to expect. My goals for participating included to better my public speaking, build strong working relationships within Gippsland Water and other water authorities, develop my leadership skills and expand my knowledge of the water industry.



*NODP Group 2019 at the graduation ceremony.*

Generally, the NODP is based around network operators and field staff. Coming from a wastewater treatment background it was challenging and interesting for me at the same time. I learnt about different areas within the water industry and how they all intertwine, about best practice, and lots of new up and coming technology.

Each of the 7 individual sessions touched on a different area of focus, providing information on where the water industry is heading, what changes are coming in the future, alongside more in depth detail surrounding each focus point. There were keynote speakers for each topic, including people from the EPA, DHHS, Worksafe and even MD's from other Water Corporations.



*Todd and Tom being interviewed at the Awards Dinner.*

There were opportunities for hands on experiences, including changing impellers on pumps, performing a repair on a water main, determining pump curves and their suitable applications. The group graduated from the course at a special awards dinner as part of the Bendigo conference.

The NODP is possibly one of the best personal and career developmental opportunities I have ever participated in. I gained so much knowledge about other areas within my own Water Corporation and spent time with people I wouldn't normally interact with.

**Contributed by** Lillie Hardy, 2019 NODP participant



## 82ND VICTORIAN CONFERENCE

A total of 1,368 attendees participated in the **Victorian Water Industry Operations Conference and Exhibition** held at the Bendigo Exhibition Centre on 4 & 5 September 2019.

The conference opening speakers were Christina Bassani, Elise O'Keefe and Simon Walsh who spoke about diversity and inclusion across the Victorian water industry and some of the initiatives being undertaken by Goulburn Valley Water.

The keynote presentation was delivered by Simon Derrick, General Manager Commercial Operations from the Richmond Football Club. Simon presented a very interesting insight into the role of sport in our communities and the amazing amount of work being undertaken by the Richmond FC in areas not normally associated with football. Simon would have been on top of the world only a few weeks after the conference, with Richmond winning the AFL flag.

At the Awards Dinner on the Thursday evening, **Lee Marshall** from Central Highlands Water was announced the winner of the prestigious Wal Whiteside Memorial, 2019 Victorian Operator of the Year award. **Tom O'Brien** from North East Water was awarded the Young Operator of the Year and the Network Operator of the Year Award went to **Ben Paul**, also from North East Water.

A number of other employees were recognised at this event including **Craig Piazza** from North East Water who won both the Hepburn Award for the Best Paper Overall and also the Best Paper by an Operator. Shekiah Inglis from Melbourne

Water and Jamie Rossato from North East Water were both recognised for their presentations. **David Dickson** from North East Water was awarded the Best Operator Poster.

This year's exhibition included 203 sites where more than 150 companies demonstrated the latest in equipment, services and process technologies available to the water industry. **3M Australia** was announced as the winner of the Ron Bergmeier Award for the Best Exhibition Site.

New initiatives introduced at the conference this year included a Women of Water breakfast and the opportunity for local year 12 VCAL students to be shown around the conference. A number of different potential career opportunities were explained by exhibitors and Committee members alike. Both these initiatives were very well received. The conference also hosted the Ixom Best Tasting Tap Water in Victoria competition with the Barwon Water entry from the Wurdee Buloc WTP entry judged as the best.

Through the WIOA charity fundraising efforts over the year, a cheque for \$2,500 was provided to WaterAid to assist their work across the globe to support the world's poorest people who do not have access to safe water, sanitation or hygiene.

The winners of the Main Tapping Competition, **Luke Smith and David Taylor** from Wannon Water also selected WaterAid as their charity of choice. A cheque for \$1000 has been forwarded by WIOA.



*The Drain Man mascot with Jill and Russell.*



*The visiting group of students from Bendigo Secondary College.*



*Delegates chilling between paper sessions.*



*Huge crowd at the Taste Test heats.*



*Entertainer Darren Carr with the "Project Officer".*



*The Choose Tap mascot.*

# 82ND VICTORIAN CONFERENCE 2019 WINNERS

Congratulations to all the award winners from the Victorian Conference and Exhibition.

**AUSTRALIAN  
WATER  
ASSOCIATION**



**IXOM**

**IXOM**



**Victorian Operator of the Year**  
**Lee Marshall**  
from Central Highlands Water

**Victorian Young Operator of the Year**  
**Tom O'Brien**  
from North East Water

**Victorian Network Operator of the Year**  
**Ben Paul**  
from North East Water

**Hepburn Prize for Best Paper Overall**  
**Craig Piazza**  
from North East Water

**WIOA Awards for Best Paper by an Operator**  
1 **Craig Piazza**  
from North East Water  
2 **Shekiah Inglis**  
from Melbourne Water  
3 **Jamie Rossato**  
from North East Water

**Ixom Victorian Water Taste Test – Finalists**  
• Barwon Water  
• Wannon Water  
• Westernport Water

**Ixom 2019 Best Tasting Tap Water in Victoria**  
**Barwon Water** for the sample from the Wurdee Boluc WTP

**WIOA Award for Best Poster by an Operator**  
**David Dickson**  
from North East Water

**Main Tapping Competition**  
**Luke Smith and David Taylor**  
from Wannon Water

**Ron Bergmeier Award - Best Exhibition Site**  
**3M Australia**



Victorian Operator of the Year  
Lee Marshall.



Victorian Young Operator of the Year  
Tom O'Brien (R) from North East Water with Charmaine Quick representing IWA Vic.



Victorian Networks Operator of the Year  
Ben Paul (R) from North East Water with Mike Rankin from Water Training Australia.



Winner of the Hepburn Prize for the Best Paper Overall, Craig Piazza (R) from North East Water with WIOA Committee member Grant Waite.



Best Operator Paper winner, Craig Piazza (R) from North East Water with Anthony Evans from WIOA.



Best Operator Poster winner David Dickson (R) from North East Water with WIOA Committee Member Elise O'Keefe.



The 3M Australia team, winners of the Ron Bergmeier Award for best exhibition site.



## SECOND SOUTH AUSTRALIAN CONFERENCE

A total of 170 attendees participated in the **South Australian Water Industry Operations Conference and Exhibition** held at the brand new Murray Bridge Racing Club facility on 7 & 8 August 2019. Running on a slightly different format to WIOA's East Coast events, the SA conference starts with lunch on the Wednesday, includes a dinner in the evening and then continues for the morning of the Thursday.



*The delegates at the Opening session.*

This format provides the opportunity to access two separate Keynote speakers. The first Keynote presentation was delivered by Kirsty McCulloch who spoke about the importance of a good night's sleep, all in the context of fatigue management and maintaining personal health and well being. The second was by Daniel Hoefel from SA Water who spoke about the issues relating to managing water storages where the public has recreational access.

There were a number of other excellent presentations across the sessions from operators, engineers, industry suppliers and other experts, including a report on the New Zealand tour by SA Operator of the Year in 2018, Brendan Roesler.

Immediately following the last paper, Adrian Cavallaro from Allwater was announced as the winner of the Control Components award for Best Paper by an Operator. Adrian now has the opportunity to deliver his paper again at another WIOA conference in 2020.



*Best Paper in SA,  
Adrian Cavallaro.*

The delegates at the Wednesday Dinner were entertained by Joel Ozborn (along with Rod Wellings) and the first winner of the revamped Kwatye Award, sponsored by TRILITY was unveiled. Congratulations to Paul Beard from Water Corporation in WA for his wonderful project allowing significant inclusion with the Kimberley region indigenous community.

This year's exhibition included 33 sites where companies demonstrated the latest in equipment, services and process technologies available to the water industry. The conference also hosted the Ixom Best Tasting Tap Water in South Australia competition with all the attendees doing the judging at lunch time on the Wednesday. The four Grand Finalists selected from the heats were Swan Reach; Morgan; Barmera and Summitt Storage. Congratulations to the TRILITY team from the Swan Reach WTP which was announced the 2019 winner.



*Discussing issues during the exhibition.*

A charity raffle was held over the course of the event with a walk across the roof of Adelaide Oval as the main prize. As a result, a cheque for \$1,000 was presented to WaterAid to assist their work across the globe to support the world's poorest people who do not have access to safe water, sanitation or hygiene.



*Joel Ozborn entertaining dinner guests.*



## Operator of the Year

Leigh Walton received the WIOA Tasmanian Operator of the Year Award, sponsored by TasWater at the recent Interest Day held in Scottsdale and Ringarooma. Leigh has dedicated 30 years to the water industry as a plumber and senior operator with Latrobe Council, Cradle Mountain Water and now TasWater.

During this period he has demonstrated a commitment to innovations, safety, productivity improvements and making a positive difference to the North West Tasmanian community. Leigh is highly respected by his peers and reports, and consistently displays outstanding personal behaviour and performance.

Leigh is a highly valued member of the Urban Networks Department, providing strong and consistent leadership and a genuine enthusiasm for improvement in himself and his team.

Leigh has shown an interest in innovation and has developed a pipe fitting enabling connection of old and new sewage infrastructure. This innovation is currently being considered for a patent. Leigh has played an integral role in the development and implementation of preventive maintenance programs across various assets including sewer network cleaning, water network scouring and air valve and PRV maintenance.

Leigh is responsible for the safe delivery of high risk works within his team and has used his extensive experience and attention to detail to ensure that all works are completed safely and are accurately documented.

Leigh has welcomed several opportunities to share his knowledge and experience more broadly across the TasWater business by accepting secondment opportunities to the Urban Networks team in Launceston. He has also undertaken the TasWater "Go Lead" program and is currently participating in a TasWater LEAN / six sigma program.

In addition to his achievements at work, Leigh is a dedicated family man and a father of two children; he is heavily involved in his kids sporting pursuits and is an active participant in his local martial arts community, volunteering as a trainer in Taekwondo.



Leigh Walton (L) being congratulated by Neal Synott.

## Young Operator of the Year

Brielle Gray was rewarded for her dedication by being announced as the 2019 WIOA Tasmanian Young Operator of the Year. Brielle is an important member of the West Coast Service Delivery team. She has been recognised for her outstanding commitment to TasWater and customers, often willing to step up and help out in a multitude of areas.

Brielle commenced her employment with TasWater in March 2018 as a Trainee Water Service Operator. Brielle has shown outstanding commitment to TasWater and customers. She is always willing to step up and help out in a multitude of areas including the West Coast and as backup operator for King Island. Brielle is willing to help out in any situation and completes her assigned work with minimal fuss.

Brielle has a strong safety ethic. She has had no notable injuries, looks out for her team mates and always puts safety first. She will always escalate issues when something isn't right from a safety perspective. Brielle is prepared to report incidents and issues via the IRIS system, including water quality issues and sewer overflows.

Brielle follows all the operational procedures developed during MOS, completes all tasks assigned to her and works very well with other team members. Brielle also provides input to improve the current procedures to ensure conformity and compliance.

Brielle's commitment to regulatory compliance is commendable, nothing is an issue and she always works well inside the regulatory guidelines. Brielle participates in the on call roster to ensure essential services are maintained for TasWater customers.

Brielle is known for looking out for her team mates and being willing to help out in any situation.



Brielle Gray with Neal Synott.

For winning their respective awards, TasWater has sponsored both Leigh and Brielle to join the WIOA contingent on the tour to New Zealand in May 2020.

## VICTORIAN OPERATOR OF THE YEAR

AUSTRALIAN  
WATER  
ASSOCIATION

Congratulations to Lee Marshall from Central Highlands Water who was announced as the winner of the 2019 Victorian Young Operator of the Year Award sponsored by AWA at the Bendigo conference.

Lee has been employed at Central Highlands Water for the past 11 years, and he is a dedicated water treatment operator with a consistent and strong work ethic. He began his career as a field maintenance trainee working in the reticulation system, managing bursts and issues in the network. He completed his traineeship and was successful in gaining a full-time role within the Maintenance Delivery team and has not looked back since.

Lee has demonstrated that he is very driven to succeed and learn new aspects of the business. In 2013 he applied for the role of Water Treatment Operator.

Since joining the Water Treatment Team, he has gone from strength to strength. He has successfully acted in the Water Treatment Team Supervisor role on many occasions, he manages to step from team member to supervisor with ease and is well respected by his team and division.

In 2016, Lee requested the opportunity to apply for the Duty Managers role within the business. This role is an on-call position that looks after the maintenance field staff after hours, and is over and above his Water Treatment Operator role. He was successful through the interview process and since then has been a member of the Duty Management Team. This role has seen Lee manage a team of staff, ensuring their safety and the provision of services to customers at all times.

During 2018, Lee applied for and was successful in gaining the role of Acting Water Treatment Team Leader for six months. The change in role meant that Lee moved from being an operator to being the leader of the group, which he managed seamlessly. Feedback from across the Corporation was that Lee had done an outstanding job and managed the integration into the office very well. Lee participated in the Emergency Management and Planning Committee and the Water Quality Committee during this time, continuously adding to his work experiences and thriving with each challenge.

Lee is a dedicated Water Treatment Operator and has often said that the most satisfying thing about his role is the service he provides to the community.



Victorian Operator of the Year, Lee Marshall.

## VICTORIAN YOUNG OPERATOR OF THE YEAR



The winner of the 2019 Victorian Young Operator of the Year Award is Tom O'Brien from North East Water.

Tom commenced his career at North East Water as a Customer Services Operator, then shifted to a role as a Restrictions Officer before eventually attaining his goal of landing a role in Operations at Benalla (after applying for 2 other Operations roles). There were times where Tom was spending 'half of his weekly wage on fuel' to simply attend work in Wodonga (from Benalla) on a daily basis.

Tom is working in a small team who have broad responsibilities of catchment management, water and wastewater treatment, as well as reticulation maintenance, including the responsibility of being on-call. He loves his role, and has fitted into the team really well. Tom has a passion for learning and developing, safety (he is an OHS Representative) and he has made significant progress through his Certificate 3 in Water Operations.

Tom strongly aligns with North East Water's values of Trust, Honesty, Teamwork and Respect, and is also committed to the Benalla team's trademarks as competent, dedicated and professional.

Tom's history with Customer service roles has been invaluable, and is demonstrated through his rapport and empathy with customers when carrying out Operational duties.

Tom has stated that he 'would love to progress into a leadership role and take on more responsibility on a day to day basis'. Tom also stated that he 'never regrets a day that he comes to work'.

All these reasons and many more make Tom a very worthy winner of the Young Operator of the Year

For winning the award, Tom receives a Perpetual trophy, a plaque to keep and the best bit – IWA Victoria provides an all expenses paid trip to join the WIOA delegation on their tour to New Zealand in May next year. The trip is valued at over \$2500.



Victorian Young Operator of the Year Tom O'Brien.



# VICTORIAN NETWORKS OPERATOR OF THE YEAR



Congratulations to Ben Paul from North East Water who was announced as the 2019 winner of the Victorian Network Operator of The Year Award, sponsored by Water Training Australia, at the Bendigo Conference.



*Ben Paul and Mike Rankin at the awards dinner.*

This award is presented to one of the participants in the WIOA Victorian Network Operator Development Program that is conducted throughout the year. The aim of the award is to provide encouragement to all NODP participants to be engaged fully in the Program and to recognise the achievement of the most outstanding participant.

There were a number of exceptional candidates in this year's group and any one of the participants could easily have been worthy winners. After considering activities such as completion of the projects, the presentation to other participants, the level of engagement, interaction and participation in the sessions, demonstrated growth in both technical and leadership fields, and appropriate feedback from his employer, Ben was the stand out for the judges.

For winning the award, Ben receives the Perpetual trophy, a plaque to keep and the best bit – Water Training Australia has provided a grant of \$3000 to be used for an appropriate professional development opportunity of his choice.



*Ben (C) during the team building exercise.*

## Ben's Reflections on the NODP

At the WIOA conference in 2018, I was asked if I'd be interested in participating in the 2019 NODP. Initially I was a little bit hesitant as I was in the middle of completing my Certificate 3 in Treatment, and was worried about fitting this into my already busy workload. After chatting to a few people and some gentle persuasion from my co-workers, I decided this is something I'd pursue.

Fast forward to February 2019 and I arrived in Attwood for session 1. Here we were 13 strangers from various water authorities across Victoria and 1 from NSW. The program covered a number of aspects including leadership, distribution network hygiene, asset management and pump operations, with a strong focus on new and innovative technology. We were required to complete an assignment on each topic prior to the next session, with the questions calling for us to network within our respective organisations to find the answers.

The program concluded at the WIOA conference in Bendigo, where I was lucky enough to be named the winner of the Network Operator of the Year Award, which was a very humbling experience. It was a great way to meet fellow industry colleagues and share ideas, processes and procedures and also hear about concepts and new innovations from industry experts. If you are someone who welcomes the challenge of learning new concepts and interacting with people, I would highly recommend it. I've learnt a lot from this course and also met some great people along the way.

## VIC CONFERENCE - REFLECTIONS FROM A KEYNOTE SPEAKER

I really enjoyed the time meeting the 'WIOA team and understanding more about the water industry.

"On behalf of the Richmond Football Club, I wanted to thank you for inviting me to be part of the WIOA conference in Bendigo. I was extremely impressed by the scale and size of the conference and the depth of personnel and industry stakeholders who participated across the event. The industry is full of very passionate and engaged stakeholders who are doing some remarkably innovative and important work in our communities. I was particularly impressed with the pathway programs which are focussed on finding, nurturing and developing diverse talent to be part of this critical and exciting industry. Thank you to the team at WIOA for including me and giving Richmond Football Club the chance to share our experiences, but importantly, also learn from others."



*Simon doing his Keynote presentation.*

**Contributed by** Simon Derrick, General Manager Commercial Operations, Richmond FC



# TASTE TESTS

## Swan Reach water is tops

The fifth Ixom South Australian Water Taste Test saw a record number of entries compete for the title of being the provider of the Best Tasting Tap Water in South Australia. Held at the SA Conference in Murray Bridge, 24 water treatment facilities were narrowed down to the 4 grand finalists from Barmera, Summit Storage, Swan Reach and the Morgan WTP that was looking for an unprecedented third win.

All attendees were invited to participate in the grand final judging, examining the appearance, odour and taste prior to casting their vote for the one they preferred the most. You could have easily mistaken that the panellists were sampling wine not water in the manner that they took to the task.

When the votes were counted, it was the TRILITY team that operates the Swan Reach facility on behalf of SAWater that won the day. The Swan Reach facility services approximately 70,000 people across parts of the Barossa and Yorke Peninsula.



Tania from Ixom and Robran Cock tasting some of SA's finest in the water taste test.



James & Greg from SAWater hoping to regain the title in the water taste test.



Daniel Hoefel from SA Water and Brendan Roesler from TRILITY accept the taste test trophy.

## Barwon Water – Wurdee Buloc Water Treatment Plant

The Barwon Water Wurdee Boluc Water Treatment Plant was awarded the Ixom 2019 Best Tasting Tap Water in Victoria at the Bendigo conference.

Wurdee Boluc WTP draws its raw water from a number of different sources such as the Otway catchment, the West Barwon Reservoir and also parts of East Barwon River, Callahan Creek, Matthews Creek and Pennyroyal Creek. Groundwater is used to supplement surface water during times of reduced rainfall. Untreated water sits in the Wurdee Boluc Reservoir before being transferred to the water treatment plant.

Treated water is supplied to Geelong Central, Geelong's southern and eastern Suburbs, as well as parts of Newtown, Geelong West and Highton. In addition, the water is transferred to the Bellarine Peninsula, supplying towns such as Ocean Grove, Leopold, Queenscliff, Clifton Springs and Torquay.

The water would service around 160,000 (permanent population) and up to 296,000 during the summer months.

Direct enhanced filtration, chlorination and fluoridation is the treatment process.



Barwon Water wins Best Tasting Tap Water in Victoria.

Aerial view of the Wurdee Boluc WTP.



Wurdee Boluc filters.



# MACKAY HAS A DROP WORTH DRINKING

Mackay in North Queensland, is officially home to Australia's best tasting tap water for 2019.

Water from Mackay Regional Council's Marian Water Treatment Plant was named Australia's best at the 2019 Ixom Best Tasting Tap Water Competition in Dunkeld, Victoria, last month.

Mackay beat the other State finalists – NSW Shoalhaven Water, Tasmania TasWater, South Australia SA Water, Victoria Barwon Water and Western Australia Water Corporation – to claim the title.

Mayor Greg Williamson said Mackay's win was no fluke.

"For the last two years we have won the Queensland title, firstly with water from the Nebo Road Water Treatment Plant in 2018 and then the Marian Water Treatment Plant in 2019," he said.

"Both were national finalists and now we have the Australian title."

Mackay's water is sourced from the beautiful Pioneer River, which originates in the tropical rainforests of the Eungella National Park and the Crediton State Forest.

It is then treated at the Marian Water Treatment Plant using clarification, filtration and chlorine disinfection processes, and distributed to more than 6000 Marian and Mirani residents.

The Marian Water Treatment Plant was built in 2015, changing the town's water source from bore water to river water, to increase water supply and improve water quality.

Mayor Williamson said the win was also testament to council's professional and dedicated water services team.

"Our treatment team have spent the last few years optimising everything in the treatment plant, to ensure we are doing the right amount of chemical addition and our processes are efficient to deliver great tasting water," he said.

"This win wouldn't be possible without the professionalism of our entire water services team, including operators, engineers, planners, maintenance crew and our scientists who are committed to providing clean, safe drinking water for our region."

The Marian Water Treatment Plant has an operator on 365 days of the year.



Mackay Team - Stuart Boyd, Brad Richards, Leon Atta, Mark Vairy, Brian Woods and Emma Schmitz.

It is a one-to-two person operated plant and the entire water treatment team knows how to operate this plant and council's other water treatment plants and bore sites, so we are delivering consistent water quality across the region.

Mackay will now represent Australia at the annual Berkeley Springs International Water Tasting Competition in West Virginia in the United States next year.

Congratulations to Mackay Regional Council and best of luck in the United States.

## TASTING TRANSPARENCY

Those in attendance at the 2018 Victorian Conference in Bendigo would have noticed a film crew taking footage at various stages of the event. The film crew was a group of Swinburne University Film & Television students who created a documentary around the Victorian and National Best Tasting Tap Water competitions.

The team captured the competition from all angles and interviewed participants and competitors. The film crew also attended the national competition in Toowoomba, capturing the announcement of the Australian champion and more footage.

After an embargo period where their final film "Tasting Transparency" was entered into a number of competitions, the final documentary was released in August. It followed the Wannon Water team in their quest to win in Victoria and then nationally. The short film can be viewed from the WIOA website and it is well worth a look.

Following on from winning the National final in Toowoomba, the Wannon Water team represented Australia in the International Taste test in the USA in February 2019 where they won the silver medal in the Municipal Water category. The plaque from the US was presented to the Wannon Water team at Bendigo conference.



Wannon Water reps Andrew Povey, Wayne Murdoch and Anthony Evans with the silver medal plaque from the US competition.



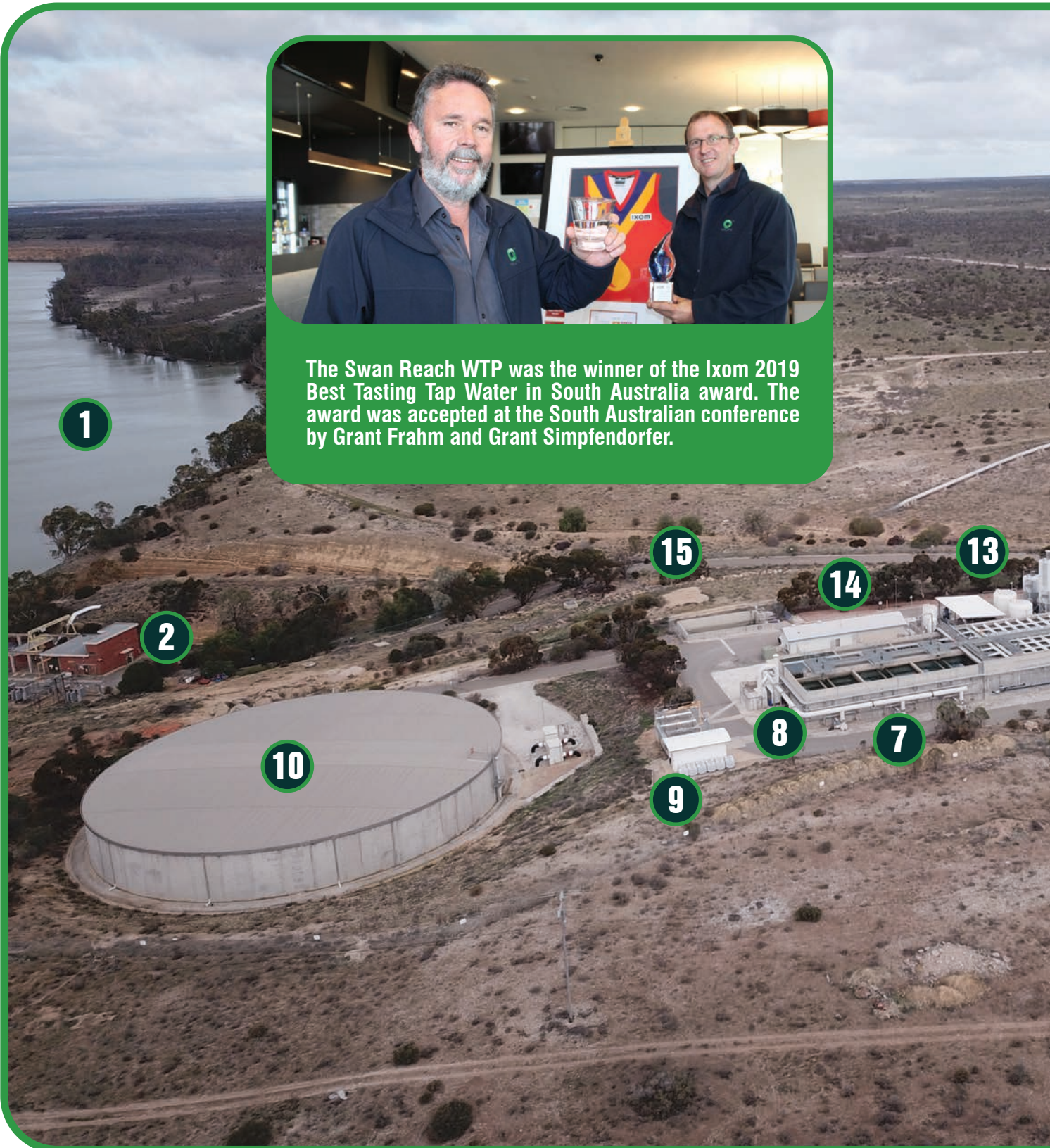


## BIRDS EYE VIEW - Facilities Members Operate

### Swan Reach Water Treatment Plant - SA



The Swan Reach WTP was the winner of the Ixom 2019 Best Tasting Tap Water in South Australia award. The award was accepted at the South Australian conference by Grant Frahm and Grant Simpfendorfer.





The Swan Reach WTP has a maximum capacity of 90 ML/d and services approximately 70,000 people across parts of the Barossa and Yorke Peninsula. Construction commenced in 1996 and it was commissioned and placed into service in February 1998.



- 1 **River Murray** - raw water source.
- 2 **Raw Water Pump Station.**
- 3 **Powdered Activated Carbon Contact Tanks** - Contact time for organic removal from PAC dosing.
- 4 **Rapid Mixers** - Coagulant chemical addition and mixing. pH correction for optimised coagulation can also occur at this point.
- 5 **Flocculation Tanks** - Gentle mixing to promote larger floc particle growth. Can add a flocculant aid chemical if required.
- 6 **Clarifiers** - Large settling tanks with lamella tube settlers to remove bulk particulates.
- 7 **Filters** - Dual media (sand/filter coal) gravity filters to remove fine particulates.
- 8 **Filter Outlet** - Collection of all filtered water.
- 9 **UV Disinfection Channels** - UV irradiation of filtered water for additional log removal of certain contaminants such as Giardia that are unaffected by chlorine. Disinfection with chlorine gas and ammonia solution also occurs at this stage. Dosing points for fluoridation and pH adjustment.
- 10 **Treated Water Storage Tank** - 12ML storage tank prior to distribution.
- 11 **Sludge Lagoons** - Three lagoons designed for air drying water collected through plant waste streams. Supernatant is returned to the head of the plant.
- 12 **Treated Water Main** - Rising main delivering up to 90 ML/d of treated water to distribution networks.
- 13 **Chemical Dosing Area** - Multiple storage tanks, hoppers and dosing equipment for process chemicals.
- 14 **Control Building** - Plant hub containing main control systems and site laboratory.
- 15 **Dirty Water Pit** - Collection point for plant waste water streams from activities such as filter backwashing and clarifier sludge removal.



# FNQ INTEREST DAY 2019

WIOA staged another of its annual FNQ Interest day followed by the optional TRILITY Charity Bowls afternoon in Cairns on Friday 11 October 2019.

A small group of operators and Water personnel from Cassowary Coast Regional Council had the opportunity to attend again and it was great to see a good attendance of new and familiar faces from around the local area.

All up, over 60 water and wastewater staff from FNQ Councils and Corporate members attended the technical information presentations in the morning. Around 40 stayed on for the optional charity bowls afternoon which was a great opportunity to meet and network with each other.



*The assembled delegates.*

The Keynote address was delivered by Dr Ben Tscharke (UQ) and covered emerging contaminants in wastewater and potential impacts on our systems and operations. It was very interesting to hear about the types of compounds that are appearing and potentially building up in our waste streams. Also for me, it provided an interesting insight into a whole range of demographic and other information that can be gained from this area of study.

There were a range of other presentations from various Councils. Scott Buckley (Water Treatment Services) talked about streaming current detector control of water treatment barriers. I found this of great value, having never worked with this technology and it helped me understand it's advantages. Damian Bayley (TRILITY) presented on baffle walls in clearwater storages; Mark Gwynne (Cairns RC) showed a number of videos and described the Edmonton WWTP Belt Press Refurbishment project.

Morris Hammill (Mareeba SC) spoke on the Barang St Sewer Pump Station Capacity Upgrade, a challenging operation in a sensitive environment. Shaun Johnston (Burdekin SC) described the Challenges of STP Maintenance Programs at the Ayr/Brandon and Home Hill STPs. He highlighted the importance of good communication with the DEHP who he said were surprisingly good to deal with when they being kept informed. Dave Cameron (**qldwater**) did an update on **qldwater** and some skilling and training Initiatives. This was followed by a quick WIOA Update.



*Morris Hammill presenting.*

The technical side of the day was sponsored by Water Treatment Services and Cairns Regional Council. After a very tasty lunch and "networking" with fellow colleagues and suppliers, we headed out for the second running of the FNQ Water Main Tapping competition. Denny Philips from Cairns Regional Council was the head judge and MC and provided a turn-by-turn description of the competition. Reece Civil supplied all the tools and equipment and were onsite to ensure everything was used correctly. The winners in 2019 were the Cairns Regional Council team of Jay Singleton and Jacob Breen.



*FNQ Tapping competition under way.*

The final part of the day was the Charity Bowls afternoon sponsored by TRILITY along with Reece Civil, Xylem, McBerns, Aquatec Maxcon, Hanna Instrumentation, Professional Pump Services and Irrigation, Prominent, Royce Water Technologies and **qldwater**. This was also a time to have a chance to talk to fellow staff from other Councils and all the suppliers. All in all a very good afternoon was held by all who participated.

The winners of the day and Tradies cup was the team representing **qldwater** of Dave Cameron, Jon Ham from Cairns RC and Ben Tscharke.



*The **qldwater** team of Dave Cameron, Jon Ham from Cairns RC and Ben Tscharke.*

Each year WIOA has rotated the responsibility for nominating a charity to receive the proceeds from the bowls afternoon and this year it was Mareeba Shire Council's turn. The cheque for \$1,500 was allocated to the Mareeba Shire Council Mayor's Christmas fund. A special presentation ceremony was held where the 2019 Queensland Operator of the Year, John Van Ryt from Mareeba SC presented the cheque to Mareeba Mayor, Councillor Tom Gilmore.



*Cr Tom Gilmore (L) receiving the charity cheque from John Van Ryt.*

Thanks to all the sponsors for their involvement and everyone at WIOA for the effort in putting this great event together.

**Contributed by** Chris McCallum and Shane Bandiera, Cassowary Coast Regional Council



# 2019 VICTORIAN CONFERENCE FEEDBACK

## What the Delegates Thought

*David Sheehan, Coliban Water*

An essential event that all operational staff should try to attend as often as they reasonably can

*Neville Whittaker Rep for GV Water*

I believe this conference was one of, if not, the best conference held by WIOA. While I cannot pinpoint one single reason for this statement, I can suggest it was a combination of many small items.

There was a pleasant and relaxed feeling about the complete conference, from set up to completion. The whole operation appeared very well organised and was presented in a very professional way. Overall, I believe the WIOA team did an excellent job and need to be congratulated. So well done, and keep up the exceptional work.

*Fiona Robertson, Central Highlands Water*

The Victorian Operators conference is a great way for our operations people to connect and one of the very few opportunities to do so. Each year we come away having learnt something new, whether it be from the paper presentations or the poster presentations - there are always great take home points to ensure our organisations improve. This year there were great presentations regarding electrical safety around water meters, arc fault containment at Electrical Cabinets, and updates to the Chlorine Storage Standards - all very pertinent to the industry regardless of where you work.

We were also touched by Kate's very personal story regarding Melanoma - Kate's poster and presentation got the conversation going, which I'm sure will save lives.

The inaugural Women of Water breakfast was definitely a highlight, this is a great initiative of WIOA to allow for new female members to connect with other Women prior to the start of the conference and I'm sure will only get bigger in the coming years.



*Women of Water breakfast participants.*

*Lillee Hardy, Gippsland Water*

WIOA is possibly the best conference I have attended. The passion the team at WIOA have for the industry is inspiring. Bringing everyone together to get involved and learn about what up and coming technology there is, and showing recognition to people within the water industry for all their hard work and talent.



*Craig Piazza talking about electricity issues.*

## Exhibitor Comments

*Michael ISC Services*

I found genuine interest from operational staff of utilities encouraging. We had good traffic over the 2 days and have had both phonically and emails from utilities interested in our products which has not been the case with other trade shows.

*Charles Waring, Universal Corrosion Coatings*

I would love to see a lot more young people encouraged to attend. VCAL students from schools. Also Exhibitors should make it a point to encourage young engineers to attend, because you learn a lot at these events, and more importantly you get to meet influential people. We are not going to be around forever, the batten has to be handed down at some point to the future generation.

*Arthur Kokolekos, LuminUltra APAC*

The WIOA Vic Conference and Exhibition is a tremendous showcase of the energy, passion and commitment of the people in our industry. From the "tradies" perspective it's a chance to learn from the operators and educate them on our solutions to help them in their jobs and operations. Glad to say delegates and visitors alike were very receptive and engaging. From a personal perspective it's an enjoyable time for all. From the business perspective, it represents great return on investment.

*Deborah Ramsay, Cadia Group*

WIOA provides exceptional event opportunities. They are run professionally and we always have very positive response from the attendees. Can't fault!

*Suzanne Chan, FILTEC*

WIOA Victoria was a great opportunity for us to meet potential customers and suppliers, at the same time be in the know of what is happening in the industry.

## RINGAROOMA INTEREST DAY

On Tuesday 15 October, a WIOA Interest day was held in Scottsdale in Tasmania's North West. The key focus of the program was showcasing membrane technology, with an aim to lift the lid on a methodology often regarded as a "black box" treatment process. Despite the distance, it was hugely encouraging to see operators and front-line managers turn out from across the state to share experiences and develop new skills.

The program kicked off with Larry Smith, Area Manager Regional Services providing a real life insight into what life with a modern membrane plant is really like. Larry and his team have now been operating the Ringarooma WTP and distribution system for a little over 2 years and it was clear from discussions they have learnt a few things along the way. Sharing experiences and knowledge such as this in relaxed informal forum is what makes these interest days so valuable.



*Larry Smith (c) at the tour.*

Next up was a WTP tour from the principle operator Phil McWatters of his truly cutting-edge plant. The plant employs a revolutionary new membrane technology which is the first full scale operation anywhere in the world. It was great to hear Phil's "warts and all" account of how this new process has developed and evolved, and how his experience can now be transferred to other new plants in the state using this technology.



*Phil McWatters describing the plant operations to attendees.*



*Stephen Westgate checking the membrane cartridge.*

Lunch was kindly provided by membrane supplier Pentair and the break in proceedings provided an opportunity to recant stories from the trenches and build new relationships.

Straight up after lunch was an informative presentation delivered by Pentair's Peter Cooper on the exciting new membrane technology we had seen in action prior the break. This proved a valuable opportunity to discuss the early teething problems we had experienced trialling this new technology and the steps Pentair are now taking to learn and develop their product.



*Peter Cooper from Pentair presenting.*

Next up saw an interview with last year's operator of the year Rodney Innis on his experience touring New Zealand's water and wastewater systems. He shared pictures and stories of his trip and described how he has now built new truly international partnerships.

The technical part of the day culminated in the awarding of the 2019 Tasmanian Operator of the Year to Leigh Walton and Young Operator of the Year to Brielle Gray who took over the baton from last year's winners, Rodney Innis and Brad Housego.

**Contributed by** Stephen Westgate, TasWater



# RETURNING RECYCLED MUD TO THE ENVIRONMENT

Western Water in Victoria is using innovative techniques to recycle mud dug up from water pipe repairs and return it back to the environment.

Western Water deploys 'hydro excavation' trucks to repair jobs. This is specialist machinery that uses jet water pressure and a vacuum boom to suck up soil to expose a pipe and enable its repair.



*Excavating using the hydro truck.*

The mud removed from a repair cannot be put straight back into the excavated hole as it is still too wet and won't compact properly. Instead of wasting the excess mud, it is transported by hydro truck to Western Water's Melton Recycled Water Plant. It is spread out in purpose-built holding bays to dry outside, before eventually being turned into soil.

The first batch of recycled soil is expected to be used when dried out, to re-fill holes on water pipe repairs.

This little idea has now attracted interest from other water corporations. Western Water are sharing their learnings, with the potential that this process will be implemented elsewhere.

The process takes the excess mud from a repair job, it then dries out and returns to the environment as soil. It's all about using a resource in a practical way.

This process is a win for the local environment, a win for common-sense thinking and a win for the bottom line.



*Hydro Reuse drying bays.*

Previously, the mud was disposed as waste at a licensed facility, taking up valuable landfill space and incurred significant fees to Western Water. Western Water now expect to make substantial savings by re-using the mud. There is screening and testing undertaken to determine if the mud is safe to be recycled. Most of the mud received at the Melton plant is uncontaminated. Water removed from the wet mud is then used to irrigate a nearby tree plantation.

Any mud removed near an industrial area is deemed to be contaminated and stored separately as per an Environment Protection Authority (EPA) notice. It is then disposed at a licensed facility. The project meets all regulatory requirements, including EPA guidelines for the use, transportation and storage of contaminated soil. Great Initiative by Western Water.

## PAUL WINS KWATYE AWARD

The Kwatye Award has been rebranded from 2019 with the support of new sponsor TRILITY, and our congratulations are extended to Paul Beard from Water Corporation in WA for being the first recipient.



Tim Sells representing TRILITY presented the award to Paul at the South Australian Conference Dinner in Murray Bridge in August.



*Paul Beard (L) with Tim Sells from TRILITY.*

The award now recognises an initiative involving any cultural or diversity and inclusion-based activities within a project or community in which our members serve. The award focuses on those who have gone above and beyond to further inclusion, connection and belonging for co-workers, members of the community and people from disadvantaged and marginalised groups.

WIOA received four outstanding applications in 2019 and any one of them would have been a worthy winner.

Paul has been instrumental in developing a range of initiatives to increase engagement and opportunities for indigenous people in the West Kimberley area. Paul's project included two components, the development of a Native Seed bank in partnership with the Mamabulanjin Aboriginal Corporation, and the Kimberley Community Grants Project.

Paul will now embark on a week long cultural exchange trip to China to inspect a number of water projects along with participating in some sight seeing opportunities.

# QUEENSLAND WATER DIRECTORATE ANNUAL FORUM

The first day of the annual **qldwater** forum presented the opportunity to attend a site tour of the Cedar Grove STP - Environmental Centre. This is a joint venture between Logan City Council (LCC) and the Logan Water Alliance (LWA - ten years running). The full design delivery will be 145,000 EP upon completion. The first stage to be delivered mid-2020 will be MBR (20,000 EP) combined with upstream nutrient offset/revegetation program and Wetland Lagoons to achieve Licence conditions.



*Will Smith leading the tour of the Cedar Grove STP.*

The Lagoons are already seeded and growing which has the Team buzzing. The final effluent travels through discharge structures including a fish ladder, an overflow swale, energy dissipation before delivery to the Logan River. The future stages will also look at Recycled Water for agriculture as an offset alternative and investment.

The day progressed to how LCC and LWA dealt with the Community communication and the great relationship developed by having Community Champions and Reference groups on board during the engagement phase with this Rural area.



*Carlie Sargent and Bill Collie on the tour.*

The technology pitches were again outstanding, from Membrane Activated Bioreactor (great small packaged system for short and long term), Ultrasonic Algae killer with solid results on the table and the Logan City Council and Logan Water Alliance – Biosolids Gasification.

Keynotes covered Water security, the robustness and investment opportunities across the sector with like minded heads in the room.

The workshop lead by the Queensland Water Directorate was set across a diverse range of topics including:

- o Strategic sector-wide investment (Trevor Dean – Fraser Coast Regional Council)
- o Harmonising water regulation (Lisa Welsh - SunWater)
- o Understanding and exceeding customer expectations (Ben Steel - Logan City Council)
- o Building jobs in a changing industry (Narelle D'Amico - Bundaberg Regional Council)
- o Catchment Resilience in a changing environment (Chris Mooney - DEWS)
- o Data transforming the water sector / Next Gen Water (Martine Watson – Unitywater / SWAN APAC)

This set the tone for some robust discussion and building the Roadmap for Queensland Water and beyond.

**Contributed by** Bill Collie, Queensland Urban Utilities

## WIOA TALKS WIND UP

The WIOA talks Webinar sessions have come to an end for the year with the Safety in Focus webinar on 29 October the last for 2019. In all there have been five webinars in 2019 and a mix of technical and general topics discussed.



The technical sessions looked at the range of contaminants which have made it through to our sewage treatment plants and what we need to do to manage them, both in the plant and in the receiving environment. We also investigated water quality issues related to algae, blackwater and industrial outputs.

WIOA's ongoing commitment to improving the performance of the operational side of the water industry in the diversity and inclusion space was highlighted with a very successful Women in Water webinar. The presentations highlighted that women are excellent role models for others, they continue to deliver great outcomes for the industry and it is important to share and celebrate their stories and working life journeys. We finished off the year strongly when we hosted a safety session that focused on the importance of fatigue management in the workplace, risk management tools, and addressing psychological risk by investing in workplace culture improvements.

We would like to thank all presenters for taking the time to invest in the industry and showcase what is happening in their field of expertise. We also want to thank all the participants who logged in and listened to any, or all, of the presentations.

Next year we plan to deliver another wide range of industry relevant topics that will be informative and showcase the great work that is performed by operational staff that allow the water industry to continue to evolve.

If you have a topic that you think would be of interest to members or the broader industry, or if you would like to present on a topic, please email [dale@wioa.org.au](mailto:dale@wioa.org.au). See you all in 2020.

**Contributed by** Dale Osborne



## WANNON TAPPERS ON TOP



Collecting the Victorian Water Main Tapping title at the 2019 WIOA Bendigo conference is not only a great achievement for the winning team, but it also highlights the skill and commitment of the operators to the services they provide to their customers on an ongoing basis. At least that's what it means for Wannon Waters Civil Maintenance Operators Dave Taylor and Luke Smith.

Dave and Luke are a part of a committed team of seven that look after the northern end of Wannon Waters region, taking in 13 townships with water reticulation. Luke is based in Casterton and Dave, 64kms away in Hamilton. There are not a lot of water main tapping's undertaken in this area due to the lack of housing development, so Luke and Dave got together a couple of times to hone their skills in preparation for this extremely competitive competition.

Under the guidance of team leader, Andrew Povey, they were able to prepare in both their practical skills and their Steve Smith like mental strength. Being able to withstand the constant, unrelenting, high pitched bombardment of strategic disruption from Nev Whittaker, shows the type of resilience all operators require if they wish to aspire to such competitive heights.



*Dave and Luke powering on despite Nev's best efforts to put them off.*

The game plan was executed perfectly by Luke and Dave with

the team Coach "Poves" lauding his team's performance at the post competition press conference (held during Thursday night's dinner over a couple of bevies with Nev).

All jokes and frivolity aside, it was a great display of the skills of the network Operators from all teams and once again it created a lot of interest from all who attended the conference. It was great to see school groups watching on and from the video being shown back on the Wannon Water intranet, it has also created a lot of interest from internal staff alike who have never witnessed the activity before.



*Dave and Luke victorious with all the Wannon backslappers in the background.*

Congratulations to the Network Operator Development Group and WIOA for organising the event and who knows, maybe one day we may see a State of Origin between Qld, NSW, Tasmania and Victoria which would be a great spectacle.

**Contributed by** Mick Mahoney, Wannon Water

## VIC CHARITY BOWLS

After running a charity golf day in Victoria for over 20 years, WIOA decided to change things up in 2019 by running an Interest Day first followed by the Prominent Charity Bowls afternoon. This format has been very successful in Queensland and more recently in NSW.

The Technical side of the day was sponsored by Western Water and although attendee numbers were much lower than anticipated, there were four outstanding presentations. Dean Barnett from Western Water spoke about the work and projects of the Victorian Intelligent Water Network (IWN), Shekiah Inglis did a repeat of her excellent paper on reservoir mixing which was runner up for best operator paper in Bendigo, Jolon D'Amore presented on Layanhapuy Homelands in the NT and Simon Prunster talked about Yarra Valley Water's ambition to be 100% renewable.



*Simon Prunster presenting.*

After a tasty morning tea, the bowls got going in earnest with some teams taking things far more seriously than others. The indoor bowls centre meant that the fickle Melbourne weather would have no bearing on the day.

The sponsors for the bowls day included Prominent, PAAS, Royce Water Technologies, Western Water, Absafe, Willprint, Two Sisters Catering, MJK Automation, Harry the Hirer, Kirra Promotions, Enviro One, IFS and Thermo Fisher Scientific.



*Looks like things are getting a bit heated!*

After a number of ends, the grand final was between the teams from MJK Automation and Enviro One. A tense battle ensued with the MJK team victorious.

The consolation final for third and fourth was between Thermo Fisher (the three WIOA admin staff) and Harry the Hirer with the WIOA girls towelling up the Harry's team which included WIOA MD George.



*The winning team of Dale, Shekiah and Jolon.*

A total of \$3,000 was raised for charity and this will be donated to a worthy cause at the 2020 Bendigo conference.

## A VERY INTERESTING INTEREST DAY

The WIOA Queensland Advisory Committee held their latest Interest Day on 7 November at Aquatec Maxcon's Ipswich Workshop facilities. The day included a site tour of the MPA electrical workshop, the manufacturing workshop and the sandblasting and painting facilities. Around 60 members attended which was an overwhelming response and made for a very successful and interesting day for all. Great to see people from Seqwater, Queensland Urban Utilities, Unity Water and visitors from as far away as Kingaroy and even Cairns.



*Chris Landman from MPA leads a tour of the facility.*

The day was opened by Peter Ferrando who provided an overview of the Aquatec Maxcon's worldwide facilities and project work from across Australia, New Zealand and South East Asia. This was followed by Craig Mathisen who provided an update of WIOA's successes and adventures and what to look out for in the future.

Andrew Watson from Kingaroy updated us on the progress of the recently constructed Nerreda WWTP for recycled water and the outstanding benefits provided to the local community. Andrew and Adam Branch from the South Burnett Regional Council explained the reuse of A Class effluent from this plant and the way it has transformed local sporting clubs and their respective playing fields. Not only has some of the recycled water been utilised in this manner but also reusing Class C effluent, they have managed to grow bumper crops of rhodes grass and oats. Their catch phrase was, if you can grow cherry tomatoes in a sludge bed, then we should be able to farm.

The next presentation was from the top of the mountain with Terry Heness from Toowoomba Regional Council providing a situation when things can go wrong in water treatment clarifiers with old infrastructure. Terry explained the way settling tube modules aged over time due to UV breakdown and the continuous cleaning required for them and that they were passed their expected operational life expectancy. These issues had caused the settling tube modules to break apart whilst cleaning and to become dislodged from water up-flow. Discussions were held around whether the settling tubes were required due to the raw water turbidity consistently being under 1 NTU. The modules were replaced so that when there is a dam filling event, the settling tube modules can help treat highly turbid raw water.

Back to the Future with Garry Hargreaves (TAFE Queensland) provided an insight on the innovative Realware Technology. What an incredible bit of gear this is. Being able to receive instructions from someone from anywhere in the world, about performing maintenance duties, fault finding, what PPE is required, isolation instructions, JSEA and almost everything

you need for day to day activities. The equipment is available and is in use in some parts of the world and seems to be the future.

Wow, The Panel, just as you may have seen on TV and heard on Triple M, was witnessed live on stage at Aquatec-Maxcon's meeting room. It was led by Jason Lee (QUU) who asked a series of questions to Marcus Boyd (Toowoomba), Shannon Thomas (Unity Water) and Tim Hardcastle (QUU) in relation to the water industry and how they see it from where it is now and where it is heading. The audience was captivated and listened and interacted with enthusiasm, with some great responses and some funny jokes, Jason I think you missed your calling.



*Shannon from Unity Water was part of the great operator forum.*

Thanks to the team at Aquatec Maxcon who were perfect hosts for the day and also to Trojan Technologies who assisted with some of the event catering.

**Contributed by** John Granzien from Seqwater

## WIOA LOOK-ALIKES

We couldn't help but notice that David Blee from Ozzi Kleen, winners of the Best Exhibition Site at the Bundaberg conference, bears a remarkable resemblance to the base player from ZZ Top, Dusty Hill. You be the judge.



*David Blee  
Ozzi Kleen.*



*Dusty Hill  
ZZ Top Base player.*

If you know of a WIOA member who has a look-alike send us a photo.



# OPERATOR COMPETENCY RESEARCH

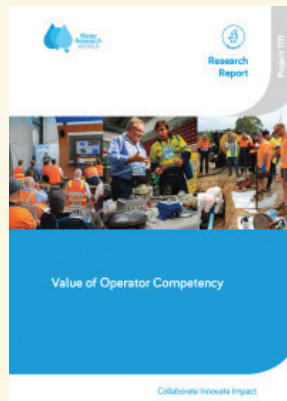
Throughout 2018 and 2019, Water Research Australia undertook a member funded project entitled “Value of Operator Competency” to communicate the value and benefits of an appropriately trained and competent frontline operator workforce.

The project involved:

- A literature review of documented water quality safety incidents, focusing on the level of frontline operator training and competency that contributed to the cause or assisted with intervention and recovery.
- A national survey to gain insight into how Australian water industry organisations currently provide operator training and competency.
- A review and comparison with other industry training and competency requirements, including the risks mitigated (why they do what they do—the reasons for the approach taken).
- Case study of the Seqwater Operations Development Program. What has been done and why, including the value/benefits gained by Seqwater.
- A review of international water industry practices, measures of effectiveness used and the risks mitigated.
- A review of how prepared the Australian water industry is for the future, particularly ensuring operator competency to work with new technology and to facilitate increasing automation.

The research has confirmed there is a need for a well-structured and dedicated approach to frontline operator training and competency and illustrates that organisations that do not provide frontline operators with a diverse set of competencies may be more vulnerable to service delivery failures. The report makes a number of recommendations (for more details refer to the full report):

1. Regulators should review frontline operator training and competency provision at an organisational level, using a nationally recognised and defined minimum competency benchmark with the objective of determining if competency deficiencies reside within the water industry frontline operator workforce.
2. There needs to be a targeted communication campaign to improve the current understanding of frontline operator competency requirements and the knowledge, skills and experience required to fulfil specific roles. The consequence of failing to meet these requirements is a potentially significant service delivery risk to water organisations.
3. The industry should consider a further study targeted at water quality safety incidents and near misses specific to the Australian context to better understand the contribution of frontline operator competency (human error factors) to the root cause of these events.



4. The Australian water industry should consider regulatory changes to drive a nationally consistent governance approach to the provision of frontline operator training and competency; either via mandated operator certification under the Water Industry Operator Competency Framework or by defined minimum competency standards for frontline operator roles.

The final report and an Executive Summary have been released and are available on the WaterRA website at <https://www.waterra.com.au/research/value-of-operator-competency/>

## BEYOND BLUE



**Beyond  
Blue**

**Shares some ways to  
help reduce stress:**

**Take time out** – Proactively scheduling ‘time out’ in your calendar each week will help you rejuvenate. Make the most of this ‘down time’ to reflect, meditate, or do something special for yourself to help keep your mind healthy.

**Reflect** – Making time to contemplate and reflect on the things you’re grateful for in life has been linked to happiness, positive wellbeing and mental health. Try to recite three small things you’re grateful for at the end of each day.

**Do what makes you happy** – It’s important to do at least one thing that makes you happy every day. This can also help take your mind off things that might be worrying you. Make time to enjoy things like listening to music, reading, gardening, or spending time with family and friends.

**Manage your workload** – Work plays a big role in our lives and is often one of the biggest causes of stress. If work is increasing your stress levels, try to avoid long hours, additional responsibilities, and learn to say ‘no’ more often. A sustainable work-life balance is really important.

**Resolve personal conflicts** – Stress in personal relationships can be a major contributor to anxiety and depression. Learning how to communicate honestly, and address problems or conflicts as they arise, will help you keep a calm state of mind. If you’re struggling with your relationship, a counsellor or psychologist can help.

**Relax and breathe** – Incorporating breathing and muscle relaxation exercises into your daily routine can be beneficial to your overall wellbeing. Taking a few deep breaths will slow your heart rate down and make you feel more relaxed.

### Counselling Services

Lifeline: 13 11 14

Beyond Blue: 1300 224 636

MensLine Australia: 1300 789 978

Kids Helpline: 1800 551 800

## BE WISE AND STAY SAFE.

This was the first time I had the opportunity to attend the WIOA Water Industry Safety Event (WISE). With an increasing focus on safety in the workplace, I saw the event as an opportunity to evaluate what other Corporations are investing in and focusing on now and in the future.

The WISE event enabled me to discover new solutions and to help our Corporation's strong aim in creating a safer workplace. The WISE event was not simply a presentation of topical safety issues. The keynote speaker '**Tara Okan**' (Aquaero NZ) "The dangers of infection from wastewater treatment plants – A personal story" - was very thought provoking and provided an opportunity to assess "could this occur in our Corporation".



*Tara Okan presenting.*

The presentations were a good mix of personal and professional learnings that left you thinking safety for days after the event.

With a unique range of knowledgeable trade exhibitors and presenters, there was ample time and opportunity to access professionals to improve my corporate knowledge. By having all the activities in the one room, it made it relaxed and accessible.



*WISE Melb Water VR demo.*

Some key aspects displayed at the event that have been followed up on and are in the process of being implemented in our business relate to drone usage, valve activation and pipe cutting. One of the benefits of the event was sharing the knowledge learnt to other areas within our business.



*The fatigue management panel session.*

The event was very well received and had the positive impact I was hoping it would achieve. I think the event is very well suited to operational managers and HSR representatives. Thanks WIOA for organising such a terrific event.

**Contributed by** Mark Putman, Goulburn Valley Water

## DIVERSITY AND INCLUSION GROUP



**diversity inclusion**

WIOA is looking to establish a group of interested members who can help to advise and assist WIOA to improve our Diversity & Inclusion culture, to help embrace diversity, celebrate differences and encourage participation in WIOA events and other activities.

All WIOA members should be able to feel respected and supported and can access and enjoy the same rewards, resources and opportunities regardless of gender, age, cultural norms, values, beliefs, and linked expectations.

Help WIOA reach this goal by nominating to be part of the Diversity & Inclusion Group.

Nominations to be a part of the WIOA Diversity & Inclusion Group closes on Friday 13 December 2019. Appointment will be for a 2-year term with successful nominees to be confirmed by Friday 20 December.

To nominate, go to the WIOA Website: <http://wioa.org.au/di/>

We look forward to working with the Diversity & Inclusion Group to deliver even more services for our Members across the country.



### NEW OPTICAL DISSOLVED OXYGEN ANALYSER

The ECD Triton D082 Optical Dissolved Oxygen Analyser is a complete solution for long term dissolved oxygen measurements in wastewater aeration basins, aquaculture and all types of environmental water. The D082 optical dissolved oxygen sensor uses fluorescence quenching to determine the oxygen concentration in water. The use of this optical method minimizes maintenance, increases reliability and improves the long-term accuracy of the measurement in demanding municipal wastewater and industrial wastewater applications.

The D082 Optical Dissolved Oxygen Sensor is unaffected by changes in the flow, pH or conductivity of the sample and there is no need to replace or service membranes, electrolytes or anode/cathode assemblies required for other sensors.

#### ECD 6 point Advantage:

- 1. Optical Dissolved Oxygen Analyser System:** DO sensor uses Fluorescence Quenching Method for better performance and less maintenance in municipal wastewater and industrial wastewater applications.
- 2. Intelligent Sensor with Stored Calibration Data:** advanced 2nd generation software algorithms and digital communication
- 3. ULTRA Long Life Membrane Cap:** provides years of service, there is no required/recommended annual membrane replacement.
- 4. Membrane Cap is Easily Replaceable:** if physically damaged, there is no need to return the sensor for factory repair or replacement, saving time and money.
- 5. Universal Design with Waterproof Fixed or Detachable Cable:** Available with hand rail mounted immersion assemblies, flow through cells and automatic spray cleaning systems.
- 6. Interfaces directly with any T80 Transmitter:** 4 to 20 mA with MODBUS RTU or HART Communication, Relays, Timers and more.

For further information contact AMS Instrumentation & Calibration Pty Ltd on 03-9017 8225 or visit their website at [www.ams-ic.com.au](http://www.ams-ic.com.au)



*Dissolved Oxygen unit.*

### WTP UPGRADE

Aquatec Maxcon has successfully designed, constructed and commissioned the upgrade of the Forsyth Water Treatment Plant in Queensland, delivering safe drinking water to the community.

The existing treatment plant was outdated, rundown and had numerous maintenance issues which required significant operator interventions and callouts. Regular breakdowns and poor process performance resulted in water quality concerns and frequently required trucking of potable water to the town during downtimes. In some instances, the small township was required to boil their drinking water due to health concerns.



*Repurposed tank.*

The \$700k project included installation of a new potassium permanganate dosing system and a new lamella clarifier which was incorporated into the existing process. An existing flocculator tank was repurposed for use as a PAC contact tank, some additional instrumentation was installed and the control system of the existing plant was upgraded with new sophisticated controls over the water quality and chemical dosing. The client was particularly impressed with changes made to the functionality of the existing DAF air saturator which was previously very inconsistent and prone to failures. MPA successfully transitioned the plant to an all new switchboard and PLC, while keeping shutdown durations within 6 hours in order to keep up the required water production.

This has been a great achievement and thanks to the teams involved in delivering this project for all of their hard work. Special thanks to Ben Johanson, James Alback, Mohsen Mobarghei, Jessica Buchanan as well as the Electrical, Mechanical, Install & Civil teams.

For more information on this project contact Zak Floyde-Smith at [zak.floydesmith@aquatecmaxcon.com.au](mailto:zak.floydesmith@aquatecmaxcon.com.au) or visit the Aquatec Maxcon website at [www.aquatecmaxcon.com.au/](http://www.aquatecmaxcon.com.au/)



*Jar testing the new plant operations.*

### VENTURI AERATOR INSTALLATION FOR BEGA CHEESE

In 2018, Bega Cheese commenced a project to upgrade their Strathmerton Plant's wastewater aeration system. The wastewater plant comprised a DAF unit, an aerated lagoon and two non-aerated winter storage lagoons, before irrigation in summer.

Aeration is required to keep the COD down and reduce odour in the aerated and downstream lagoons. The existing aerated lagoon had eight ageing surface aerators, however only one or two of these units were operated at any time. Over a number of years the surface aerators had progressively failed because of their age and repairing them meant deploying cranes and/or boats to access them. This process was expensive and had resulted in damage to the lagoon liner. Eventually it became uneconomic to keep repairing the aerators. It was decided to look for a solution that was safer for operators and easier to maintain.

Bega Cheese contacted Hydro Innovations to discuss the use of "bank-mounted" Venturi-Aeration systems. These use a self-priming pump to draw water from the lagoon. The pump discharges it under pressure through the Venturi-Aerator. The unit draws in atmospheric air using the "venturi effect", mixes it with the water being pumped, and discharges it back into the lagoon, charged with dissolved oxygen.



*The Hydro Innovations bank mounted aeration unit.*

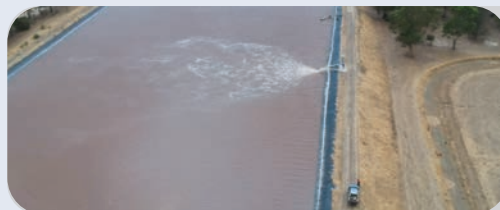
The Bega team liked the idea of bank-mounting as it gave operators easy access to equipment for monitoring and/or repair, making it safer and more cost effective to maintain. Their only concern was whether the units were as efficient as the surface mounted technologies. Hydro Innovations were able to provide information indicating that with the use of the right pump, oxygen transfer efficiency [OTE] for Venturi-Aeration units can be as high or higher than 1.86kgO<sub>2</sub>/kWh, making them at least as efficient as the surface [floating] technologies.

Bega Cheese installed a 150mm Venturi-Aeration unit early in 2019. The below photo shows the condition of the lagoon at this point, after the previous system had been decommissioned several months previous.



*Lagoon prior to the installation.*

The next photo was taken 2 weeks after the installation of the Venturi-Aerator. It can be seen that ripples from the aerator "radiate" to all parts of the lagoon, ensuring a good level of mixing.



*Lagoon 2 weeks after the installation.*

Since installation, operators have seen a continued increase in the dissolved oxygen [DO] level, and have seen COD fall by 50%, even though the higher level of mixing was re-suspending settled solids, which became more "bioavailable" to the CFU's.

The Bega Cheese crew are happy with the ever increasing levels of DO, the reduction in COD, and their odour free lagoon. The Wastewater & Maintenance Teams are also pleased that monitoring and maintenance can be done safely, and without the use of cranes, boats or winches.

More information about Venturi-Aerators or Gorman-Rupp pumps can be obtained from [info@hydroinnovations.com.au](mailto:info@hydroinnovations.com.au)

### PORTABLE ACTUATORS

Since 2018, Field Machine Tools have been a big retailer of Modec portable valve actuators across Australia. These devices have already been a success across the world from South America with BHP to France with Veolia and others. They have now found traction in Australia among the water industry. Modec portable actuators are used in various fields to operate manual valves without much effort.

These valve actuators can protect operators from injuries and also improve working condition for operators. It can help Operators to improve the process by reducing operating time, by saving time and also save money for the organisation.



**# MC89** Super light and compact portable valve actuator with great features and goes up to 900N.m and 320 rpm.

The NEW Electric portable actuator for valve adjusting has various adaptors available to catch every sort of valves (flat, deep with or without rising stem ...). It is compatible with many reaction system which will help to protect the operator. The Autonomy can run up to 1 hour, it is Fast charging and has 12 position electronic torque limiter integrated. The revolution counter and is only 5kg in weight.



More information is available from Alexandre Duffaut, Field Machine Tools on (07) 3889 7622 or via the website at [www.fmt.com.au](http://www.fmt.com.au)



## POTABLE WATER SUPPLY UTILISING MEMBRANE TECHNOLOGY

Membrane Systems Australia (MSA) has recently been announced as the successful tenderer for the Loggy Creek permanent water treatment facility on Horn Island in far north Queensland.

A temporary facility, utilising membrane separation technology and installed in 2018 by MSA, produces up to 7.5ML/d of potable grade water to approximately 5000 residents within Australia's Torres Strait Region who are now experiencing the luxury of crystal clean water. Raw water is fed from a local holding dam before entering the main filtration process. The effective removal of suspended solids, bacteria, viruses, endotoxins and other pathogens is achieved during this stage of the process producing quality treated water to ADWG that is then chlorinated in the final stage to preserve the water quality.

The entire membrane treatment system is an extremely economical and effective but simple process that has many benefits over a conventional water treatment plant, including; increased overall recovery up to 98%, smaller footprint, reduced chemical usage, simple operation and overall OPEX reductions. The system is controlled via a dedicated PLC HMI interface which enables the plant to operate automatically with minimal operator assistance. The water treatment facility utilises 3G/4G telecommunications that enables operators to connect to the PLC, allowing an operator to control and monitor the entire process of the operation on site or remotely via remote connection. The HMI uses multiple screens where the operator can log in and monitor/control the overall process operation. Notifications are sent to the operator/s via SMS to notify of alarms, faults, general or critical warnings to ensure the continuous production of quality water is possible.

The temporary system has been cleverly designed and constructed within several modified 20 foot shipping containers. This not only empowers the system to withstand harsh environmental conditions but enables such infrastructure to be transported via road and barge to its remote destination. The entire system will be relocated once the permanent plant is installed.



For more information contact Jon Tubby, National Sales Manager at MSA on 1300 851 469 or visit the website at [www.membranesystems.com.au](http://www.membranesystems.com.au)

## HEALTH-BASED TARGETS

Health-Based Targets (HBT) for drinking water supply represents a quantitative method of assessing the microbial safety of drinking water supply systems and are currently in consideration for inclusion into the Australian Drinking Water Guidelines. HBTs are community outcome focused, quantifying the pathogen hazard of drinking water supplies to the community by considering not just the rate of infection, but the severity and duration of illness.



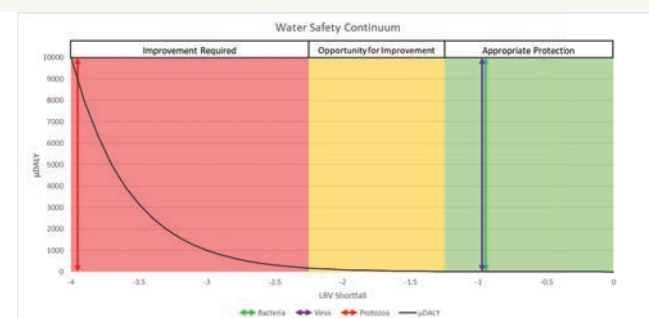
The process involves four major steps:

*Source Water Assessment*, where human and agricultural challenges to water quality are assessed

*Water Treatment Assessment*, where the performance, construction and operation of water treatment processes are reviewed

*Water Safety Assessment*, where the source water challenge is compared with the capability of the treatment processes to identify any shortfalls and the results are plotted on the water safety continuum

*Water Safety Improvement Plan*, where improvements to address shortfalls are identified and planned.



### A Plot on the Water Safety Continuum (adapted from the HBT Manual)

An important tool to assist the Water Treatment Assessment is the Good Practice Guide to the Operation of Drinking Water Supply Systems for the Management of Microbial Risk (GPG) published by Water Research Australia. This guide contains a comprehensive checklist for assessing key processes and other elements of operating treatment facilities.

The quantitative approach taken by the HBT process enables water suppliers to better understand their risk profile. This ensures not only that capital works and operating processes are optimised for the delivery of safe water, but also that the areas of greatest opportunity are understood.

You can prepare for HBTs by starting the following:

- If you don't already collect raw water E. coli data, start now to improve the source water assessment.
- Install online monitoring for key processes such as filter outlet turbidity
- Pre-assess the operation of treatment processes using the GPG

For more information, contact Glen Luscombe on 1300 799 310 or visit [www.viridis.net.au](http://www.viridis.net.au)

## NEW MEMBERS

Welcome to the following people and companies who have recently joined our Association as a Member or Corporate Supporter.

New **Individual Members** include:

Michael Smith, Andrea Gonzalez, Matthew Greig, Kelli Robertson, Amanda Hutchings, Michelle Wittholz, Tracey Still, Troy Lewis, Damien Peterson, Brett Pritchard, James Grant, Jerramy Gillespie, David Kent, Washington Itoya, Darren Heidke, Spencer McMillan, Samuel Manks, Luke Wall, Jarrod Lye, Brendon Lemon, Garry Platt, Neil Stiles, Doug Seales, Kelly Ball, Geoff Nofke, Geoff Buttler, Nick Zischke, Tom Sleeman, Thomas Ogle, Scott McMurray, Mark Morrissey, Anthony Blair, Karen Bennink, Chris Gardiner, Michael Moroney, Dean Davis, James Downs, Allan McKenzie, Anthony Murphy, Andrew Fatale, Jason Schornig, Marty Gibbs, John Bakes, Bryce James, Brian Woods, Mark Percy, Ian Frey, Gregory Harvey, Michael Hills, Anthony Proberts, John Holmes, Glenn Wiesnet, Fambisai Makamure, Ian Bulmer, Craig Sands, Joshua Potter, Steven Crispin, Leon Atta, Carmel Kennedy, Matthew Bett, Shane Baldry, Corey Wilkinson, Bailey Anderson, Michelle Baillie, Shane Barkley, Richard Bell, Daryl Bennett, Jack Brophy, Jorge Maxwell, Lachlan McGregor, James Milne, Owen Rogers, Daniel Smith, Jake Sutherland, Michelle Young, Christina Girvan, Dale Richardson, Jacob Oxley, Blake Handebo, Hashem Samarani, James Thomas, Paul Wilson, Lucy McCarthy, Dean Phillips, Jeremy Guneratne, Pasko Mikulandra, Steeve Miazdyk, Shawn Lucas, Ben Fleming, Luke Clarke, Ben Gow, Mark Inglis, Cameron Chapman, Maddison Hunger, Colin Elsum, Ebony Perrin, Tom Paynter, Adrian Cavallaro, Rajabu Rashid, Jason Deans, Stephen Parish, Chris Velis, Troy Rowe, Tony Moore, David Barber, Stuart Cassie, Maddison McCarthy, Llanethley Alexander, Casey Donnellan, Simon Woodford, Chris Brown, Frank Hobson, Peter Longstaff, Amy Norman, Josh Mills, Michael Crookes & Craig Proberts.

New **Corporate Members** include:

Active Instruments & Controls, Azano, Rankin Plumbing, Nexxis, Skylotec Australia, Viridis Consultants, Graf Australia, IC Pipes, Vermeer Equipment Holdings, iControls, Combined Safety Services & Permeate Partners.

## 20 YEAR MEMBERS

WIOA recognises any Individual or Corporate Members who have maintained their membership for 20 or more consecutive years, presenting them with a special Membership lapel pin or certificate.

This year there are another 13 Individual Members and 5 Corporate Members who have qualified for the 20 year recognition pin. The recipients of the pin in 2019 are: Michelle Colwell, Rod Curtis, Darren Dwight, Chris Keith, Jason Krzciuk, Cynthia Lim, Peter McCormack, Konrad Mueller, Trent Newton, Rohan Poll, Len Rochford, Michael Rogers and Allen Slocombe. The eligible Corporate Members are Goulburn Valley Water, Barwon Water, DCM Process Control, Merck and Thermo Fisher Scientific.

Congratulations to you all.



## COMING EVENTS

2020

- 26 February **NSW Recycling Interest Day**, Parkes
- 28 February **PASS Award** applications close
- 4 March **Victorian Recycling Interest Day**, Melbourne
- 6 March **Queensland Charity Bowls Day**, Yandina
- 19 March **Queensland Wastewater Interest Day**, Kawana STP, Sunshine Coast
- 24 March **Tasmanian Operations Interest Day**, Spreyton

## 2020 CONFERENCE AND EXHIBITIONS

- 1 & 2 April **14th WIOA NSW Water Industry Operations Conference & Exhibition**, Tamworth
- 3 & 4 June **45th WIOA QLD Water Industry Operations Conference & Exhibition**, Toowoomba
- 5 & 6 August **3rd WIOA VIC Water Industry Operations Conference & Exhibition**, Murray Bridge
- 2 & 3 Sept **83rd WIOA VIC Water Industry Operations Conference & Exhibition**, Bendigo

## WIOA COMMITTEE

|  |  |  |
|--|--|--|
| <b>President</b><br>Heidi Josipovic<br>Mob 0429 701 237                  | <b>Vice President</b><br>Mark Samblebe<br>Mob 0400 126 141 | <b>Managing Director</b><br>George Wall<br>Ph (03) 5821 6744<br>Mob 0407 846 001 |
| <b>Chair NSW Advisory Committee</b><br>Alan Butler Mob 0419 432 579      |  | Ryan McGowan<br>Mob 0440 055 508   |
| <b>Chair QLD Advisory Committee</b><br>Colin Haynes Mob 0419 763 054     |  | Elise O'Keefe<br>Mob 0438 346 852  |
| <b>Chair SA Advisory Committee</b><br>Robran Cock Mob 0407 226 130       |  | Simon Page<br>Mob 0447 058 377   |
| <b>Chair TAS Advisory Committee</b><br>Stephen Westgate Mob 0417 126 758 |  | Sally Shepherd<br>Mob 0409 800 534   |
| <b>Chair VIC Advisory Committee</b><br>Anthony Evans<br>Mob 0419 103 885 |  | Grant Waite<br>Mob 0447 450 513  |

## NEXT EDITION

**Article Contribution Deadline for the next edition is 13 January 2020**

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