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COVER

World Cup champions: Jason Day and Adam Scott secured the ISPS Handa World Cup of Golf at Royal Melbourne last November. **Photos:** Adam Scott/Jason Day trophy and Royal Melbourne crew celebration images by Gary Lisbon (www.golfphotos.com.au). Tournament images by Brett Robinson.



LEAD STORY: Royal Pines' race against time

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After successfully hosting its first Australian PGA Championship, won fittingly by local hero and Australian golf's man of the moment Adam Scott, the real test for RACV Royal Pines is set to begin. Following the upcoming Ladies Masters in February, nine holes will undergo a dramatic transformation with the goal to have them back in play and tournament ready ahead of the 2014 PGA Championship. ATM editor Brett Robinson looks back over the 2013 tournament and to the interesting year ahead for course superintendent Lincoln Coombes as the race against time begins.

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The eyes of an industry focused on Royal Melbourne for two unforgettable weeks in November as Australia's number one golf club hosted the Talisker Masters and ISPS Handa World Cup of Golf back-to-back. ATM goes behind the scenes during a hectic two weeks for course superintendent Richard Forsyth, assistants Paul Thomas and John Mann and the more than 50-strong tournament crew.



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Although held just a week apart, the conditions experienced at the 2013 Gloria Jeans NSW Open and 2013 Emirates Australian Open last November couldn't have been more contrasting. ATM editor Brett Robinson looks back at the two tournaments and some of the challenges faced by course superintendents Martyn Black and Steve Marsden.

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ATM columnist John Neylan dissects Larry Canning's Inside Golf magazine column which recently caused a widespread backlash from golf course superintendents.



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With the recent closure of Redlands, the University of Sydney's research plots at Cobbity are the only independent research facility in the eastern states. Dr Jim Hull provides an overview of the facility and its desire to remain an important asset for the industry into the future.



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University of Queensland researcher Dr Chris Lambrides provides a follow-up from last edition's research article which looked at the four year EcoTurf project that has helped to identify water and nutrient use efficient couchgrasses from exhaustive collections made across Australia.

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Brendan Allen (NZGCSA); Martyn Black (Castle Hill CC); Jason Bushell (Rowes Bay GC); Lincoln Coombes (RACV Royal Pines); Richard Forsyth (Royal Melbourne GC); Peter Frewin (AGCSA); Alan Groatorex (Chirnside Park CC); Tony Guy (STA WA); Martyn Hedley (STA QLD); Steve Hewitt (VGCSA); Belinda Hill (Perception PR); Danny Hull (STA ACT); Dr Jim Hull (University of Sydney); Steve Jacobsen (NSWGCSA); Mark Johnson (TGCSA); Richard Kirkby (Pennant Hills GC); Dr Chris Lambrides (University of Queensland); Gary Lisbon (www.golfphotos.com.au); Peter Lonergan (GCSAQ); Brendan Lowe (Rowes Bay GC); John Mann (Royal Melbourne GC); Steve Marsden (Royal Sydney GC); Graham Marsh (GMGD); Ian McKendry (STANZ); John Neylan (Neyturf); Andrew Peart (AGCSATech); Richard Stephens (Turf Australia); Paul Thomas (Royal Melbourne GC); Nathan Tovey (STA VIC); USGA.

Re-enter at your own risk

The focus on chemical use by turf industry practitioners has never been more pronounced. Recent events within the industry combined with an increased public awareness of environmental matters and reduced tolerance towards breaches, has cast a greater spotlight on chemical best practice management, with superintendents and turf managers at the forefront of this scrutiny.

At Pennant Hills Golf Club in Sydney, however, this scrutiny has reached a point where routine maintenance operations are being impacted. Over the last six months application timing has been compromised by members to the extent that it is starting to jeopardise the quality and condition of the very turf surfaces they pay to play on each year.

According to long-serving course superintendent and AGCSA member Richard Kirkby, over the past five years the club has, as is common industry practice, displayed warning signs on the 1st and 10th tees stating that spraying was taking place on the course with the date, area treated and type of chemical being applied. Material safety data sheets (MSDS), which provide information such as the properties of the chemical and safe handling procedures, are also displayed in the Pro Shop for members to read, a decision that was implemented by a previous Board.

More recently the club has elected to post the chemical label on the club website 24 hours prior to application for those members who want to know more about the products that are being applied and their associated re-entry restrictions. The majority of turf labels state that you cannot re-enter until the product is dry on the leaf and where the label states that the product has to be washed in, the quantity of water needed is often significant. Kirkby estimates this effects to some extent 80 per cent of all products applied to his course.

Sensitivity to spraying, re-entry periods and washing in products has reached the point where Kirkby now restricts spraying largely to men's days (Wednesdays and Fridays) and corporate golf days (Tuesdays). Despite having a very thorough preventative spray programme in place, the pressures being placed upon Kirkby's operations mean there have been instances when the playing surfaces have been affected. For example, in early December some dollar spot flared up over a weekend. Unable to spray on the Monday due to a ladies competition followed immediately by a shotgun start for the men, Kirkby couldn't treat the affected area until Tuesday morning by which stage the disease had worsened.

Unable to effectively balance operational and maintenance requirements, Kirkby has even gone to the extent of putting in a proposal to the Course and Playing Committee to reschedule start times on ladies days (Mondays and Thursdays) by an hour (7am-8am) and restrict play to just a one tee start. He has also requested no corporate golf play before 12 noon on Tuesdays.

Pennant Hills is by no means alone and other clubs in Sydney are starting to experience similar issues. As a result of this developing situation, a working group has been set up in conjunction with the NSWGCSA and AGCSA Gold Partner Syngenta to try and lobby the APVMA to re-word some of the labels regarding re-entry periods and the amount of irrigation required to wash products off the leaf. The AGCSA and ATM will keep abreast of these negotiations and inform the industry of any developments.

In this first edition of 2014 we take a look back at last November's stretch of major tournaments and the pivotal role that the superintendents and crews at RACV Royal Pines, Royal Melbourne and Royal Sydney played. Congratulations to all. Enjoy the read.



Brett Robinson, Editor

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GCSAA president heads top line-up of speakers for Gold Coast



Looking out the window as I write this report it is hard to believe that summer is upon us in Victoria. The weather is cloudy with light drizzle falling and the gloom of the morning more reminiscent of July than mid-December. True to form however, Melbourne's forecast for the next week is a tad more summery – 26, 32, 40, 34 – before returning to 19 and showers... delightful!

May I start this edition's Foreword Thinking by congratulating all turf managers that have produced such magnificent playing surfaces for major events over the past few months. The golf courses for the tournament season were first class and the results, barring one, were great not only for the industry but also for national pride.

Speaking of national pride, a big shout out to arena managers Kevin Mitchell (The Gabba), Damian Hough (Adelaide Oval) and Matt Page

(WACA) who have produced such outstanding playing surfaces that have proved the undoing of the 'old enemy' in The Ashes. It is great to see the Australian cricketers perform to such a high standard, but more importantly there is nothing better than seeing the English cricketers being beaten up both mentally and physically.

Back to more serious business, the AGCSA office has been quite busy with plans well underway for the 30th Australian Turfgrass Conference and Trade Exhibition which kicks off on 22 June 2014 on the Gold Coast. We have confirmed some of the keynote speakers for the event in particular **Professor Karl Danneberger** (Ohio State University) and **David Bancroft-Turner** (chief executive officer of The Academy of Political Intelligence).

Karl and David will be presenting at the Jacobsen sponsored Monday workshops which were a



GCSAA president Patrick Finlen



Finlen's Olympic Club hosted the 2012 US Open



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popular addition to the 2013 event at Twin Waters. Karl's specialty is turfgrass science, physiology and ecology and he does an excellent presentation on 'Growing degree days'. David hails from the UK and has been a past presenter at BIGGA conferences. He will bring an interesting insight into the politics within your organisation.

We are also delighted to announce that we have secured current GCSAA president **Patrick Finlen** as a speaker for the 2014 event. Pat is well known in all golfing circles for his professionalism and his meticulous course presentation. Those Australian volunteers who were part of the 2012 US Open tournament crew at The Olympic Club will certainly attest to his abilities. Pat has recently been promoted to the position of general manager at Olympic and he will provide a fascinating insight into the transition from superintendent to GM at what is one of America's most unique sporting institutions.

During the conference the AGCSA Awards are presented and it would be great to keep the judges busy with some quality nominations. The award process is great personal development and it offers an opportunity to showcase the magnificent work that is being carried out within your club. The awards presented include:

- **Claude Crockford Environmental Award**, presented in partnership with Syngenta;
- **Excellence in Golf Course Management Award**, presented in partnership with John Deere;
- **Graduate of the Year Award**, presented in partnership with Toro (nominations via TAFE's);
- **Distinguished Service Award** (bestowed by the AGCSA Board).

I appreciate that many may think nominating for awards is not in the Australian culture, but I am sure that if you ask past nominees they would encourage you to take part in the process.

Since the last edition of ATM I have fielded quite a number of calls from people seeking information on what the AGCSA is considering regarding the changes to education in the industry. This issue is a huge concern for the industry and the AGCSA is currently in discussions with an RTO to determine the best option and model to allow quality training to be offered to all at a level that the industry wants.

This process will take some time but it is felt that industry where possible should take on training and provide a quality learning outcome. I would like to state that I don't have an issue with the teachers within the TAFE system; they are passionate and provide great training. I have some frustrations with the 'system' as it currently stands and I hope that we can work together to get the best outcome for all in the industry.

In closing I hope everyone had a merry Christmas and that 2014 brings everything you hope for. Please feel free to contact me at any time in the coming year if you have any feedback. I hope the summer treats you well. 🌺



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The 2013 Australian PGA Championship signalled the start of a five year tenure at its new Gold Coast home – RACV Royal Pines. Pictured is the 18th green which will be redesigned in the second year of the upcoming \$5 million course redevelopment

After successfully hosting its first Australian PGA Championship in November, the real test now begins for RACV Royal Pines. Following February's Ladies Masters, the front nine holes will undergo a dramatic transformation with the goal to have them back in play for the 2014 PGA Championship. ATM editor Brett Robinson looks back over the 2013 tournament and to the interesting times ahead for course superintendent Lincoln Coombes.



Royal Pines'

race against time

As debuts go, things couldn't have gone much better. The crowds flocked, the weather behaved (well, up until midway through the final round) and most importantly Adam Scott, the hometown hero and Australian golf's man of the moment, delivered what the fans had come to see.

After 11 successful years on the Sunshine Coast, the Australian PGA Championship began its five year tenure at RACV Royal Pines Resort on the Gold Coast in wonderful fashion last November, putting to rest any concerns about whether the tournament could be successfully transplanted to a new venue and recreate the same atmosphere that was such a feature of its time at Coolumb.

"It's just been a fantastic week – a nine out of 10," PGA chief executive Brian Thorburn commented shortly after Scott was presented the Joe Kirkwood Trophy. "It's certainly exceeded all our expectations and all stakeholders, the government, the council, our sponsors, they're all thrilled. The way the Gold Coast embraced the tournament, I think we can grow it from here... and we know we can make it even bigger."

While Scott's maiden Australian PGA victory will be the most remembered aspect of the event, kick-starting a fantastic four week stretch of tournament golf in Australia, perhaps the real winner was the golf

course itself. Many pundits had trumpeted loudly when it was first announced that the PGA would be moving to RACV Royal Pines that the resort course would be massacred by the game's elite.

Despite tournament drawcard Rickie Fowler threatening to do that with an opening round 8-under 63, the low round of the event, that was the extent of the blood-letting. Scott would end up prevailing by four shots over the flamboyant American with a four round total of just 14-under, certainly nowhere near the high 20s some had predicted.

Thanks to the addition of seven new tees (holes 1 – which was actually just the corner of the practice putter left to grow long – 4, 10, 11, 13, 16 and 17) which added nearly 250m in length, some blustery northerly winds and very firm 328 couchgrass greens prepared by course superintendent Lincoln Coombes and his crew, the pros didn't have it all their own way.

"I was very happy with the way the course presented," reflects Coombes, who moved to RACV Royal Pines in 2010 after seven years as superintendent at the organisation's sister course, RACV Cape Schanck, on Victoria's Mornington Peninsula. "Right from when it was first announced that the PGA was coming here I didn't want to toughen up the course too much given the concerns



PHOTOS: BRETT ROBINSON

BREAKING NEW GROUND

For all the success that the 2013 Australian PGA Championship generated at its new home, it will be over the next two years when RACV Royal Pines will be put through the ultimate test, with Coombes set to be front and centre of that scrutiny when the tournament returns this December.

No sooner than the Ladies Masters finishes in the first week of February, the excavators will move in to embark on RACV's \$5 million redevelopment of the course which was revealed at the same time as the PGA's announcement that the tournament was shifting to the Gold Coast.

To be staged over the next two years, starting with the front nine this year, every hole on the course will be remodelled. Former professional golfer turned respected golf course architect Graham Marsh and his team have been charged with revitalising the resort course to give it a championship calibre look and feel and just before Christmas the final design was signed off on.

Although having been involved in countless remodelling jobs over the years, Marsh admits his company has never been involved with such a unique project as the one about to unfold at Royal Pines. Before a bucket has even ripped out the first sod, an immense amount of planning has gone into the redevelopment due to the very specific challenges which confront it.

The two most striking aspects are the extremely short time-frame to get the holes constructed and back into play before the tournament and the also the fact that because of this narrow window all the new playing surfaces will be solid turfed.

While small sections on a few fairways will be kept, more than 85 per cent of the fairways will be remodelled and laid with fresh Wintergreen couchgrass sod, with the new greens to be laid with rolls of TifEagle ultradwarf couchgrass. Twin View Turf north of Brisbane is growing the TifEagle stock, while Turf Force has the fairway paddocks under production at its farm in the Gold Coast hinterland.



Assistant superintendent Greg Jager sets the pins ahead of the second round

about it being short and I think we ended up getting the balance right.

"Along with the new tees, which were basically sand constructions that we levelled and solid turfed, we made some modifications to the fairways by bringing them in about 5m each side and grew out the roughs. The fairways came up a treat after we scarified them back in September.

"One of the things we really targeted was the firmness of the greens. We took out a couple of dustings and because they are reasonably flat we increased the rolling and brushing. We used a couple of sets of Fatboy wire brushes on our triplex greens mowers, something I picked up from Andrew Smith at Yamba Golf Club. They're something you see more in use on bowling greens, but the way they were able to rip a lot of the dead matter out of the greens was impressive.

"We started using them about two and a half weeks before the tournament and would go out every second day for about 10 days. We started at 2mm and wound them down until we got the desired result. If you have got flat greens that are very grainy, you can rip into them with these heads and get the thatch and grain out. The way the greens looked and rolled was so much better and the feedback from the players was very positive."

Nathan Nunn rolls the 12th green at RACV Royal Pines following the second round. The 328 couchgrass greens were cut with triplexes at 3mm ahead of each round and rolled in the afternoon



The numerous water bodies at Royal Pines will feature more prominently in the strategy of the new-look holes designed by Graham Marsh



Royal Pines' 2.2 hectares of bunkers will be reduced by more than half as part of the upcoming reconstruction

Following a heavy scarify back in September, the Wintergreen couchgrass fairways were pure for the tournament



Marsh was on hand during November's tournament to brief players and officials on the proposed changes, explain some of the challenges that will be faced during the redevelopment and the likely impacts for the players come the next tournament, in particular the different turf surfaces.

And therein lies the challenge that will present for Coombes and his maintenance team once the new-look holes are handed back to them – how do they go about getting them up to championship condition in a short period of time and how do they manage to get consistency of green speed, firmness and smoothness across the old and new surfaces so that the players can develop a consistent putting stroke.

"It's hugely daunting," admits Coombes. "When I first heard that we had the tournament here and they were going to redevelop the course in between, I knew the first tournament wouldn't be the one I was going to be concerned about – it was the next two.

"I don't think there's too many people that would have the experience of what we're about to go through and even now we are still thinking how it's all going to pan out. When you think of all the challenges – the short time frame, not to mention the weather here – there will be some interesting times ahead, but with a bit of luck in two years' time we'll have a great story to tell."

STRATEGY AND SUSTAINABILITY

Constructed on the banks of the Nerang River during the height of the Gold Coast course development boom of the late 1980s, Royal Pines was designed by Japanese golf course architect Tomojiro Maruyama and opened in 1990.

As Coombes quips, "if you're playing really bad, come and play here because you'll soon start to feel good about your game." A typical resort course design, the Royal Pines greens are flat and massive (1.5 hectares), the fairways generous and bunkering not penal despite their size. Although water features on almost every hole, it's purely there for aesthetics and doesn't (or shouldn't) come into play.

Hence the surprise when it got the nod ahead of some of the more challenging courses in the area such as Lakelands and Hope Island. However, RACV had the overall complete package the PGA was looking for and together with the organisation committing \$5 million to redeveloping the course, a five year deal was struck.

Marsh, whose company designed the third nine holes at Royal Pines which were opened in 2004, was given the brief to strengthen the course's championship credentials but also keep it enjoyable and relevant for the average golfer which it caters to for 50 weeks of the year. While the routing of the course remains unchanged, every hole will have a new look and the key aspects of injecting more strategy and making the course more sustainable in terms of its maintenance were at the top of Marsh's list of priorities.

To that end the overall size of the greens complexes will be reduced by nearly half with the new greens, built to full USGA specification, to have more undulations and drama to them. The 2.2ha of existing bunkers will also be significantly reduced to just over a hectare and fairways will be reshaped to address the drainage issues which currently plague the course anytime there's significant rainfall. Only a handful of new tees will be reconstructed, however, the existing tees will be heavily renovated during the works.

"An important part of the brief was to keep the course playable for the resort player and I think we

have done that while still adding enough challenges for the skilled players,” explains Marsh. “We have tried to get at least a couple of holes where the water does come into play, more so for the better players who will be able to go for the green with their second shot.

“We have concentrated on giving them at least one driveable par four – the 8th – which will be about 300m. The green will be brought forward of its current location and set more towards the water on the left. The green isn’t right up against the water, but it’s ever-present on the left hand side and if they want to knock it on the green they’ll be asked to use a long club, like a three-wood or driver.

“The greens complexes and bunker area will be almost halved and we’ve set the strategies up so that the better players must think. The one thing about the existing course is that it is fairly bland in terms of strategy – it doesn’t matter where you hit the ball, there’s no need to plot your way around the course – so we have tried to balance that out and have a lot more logical strategy for each hole.

“With the prodigious distances they hit today, the players get to a golf course through the par fives so we’ve tried to make them much more exciting and make the better players earn their birdies far more skilfully than they did this year. Furthermore, the penalties will be far greater if they miss, so there will be a bigger risk-reward element to them.”

REACHING A CRESCENDO

An important consideration for Marsh was that the new design gradually builds up during the course of the round and to that end he thinks the closing stretch of seven holes, to be redeveloped as part of the project’s second stage in 2015, will set up beautifully for tournament golf.

The 12th, which Scott dramatically eagled during his final round to all but clinch the 2013 PGA, will still be reachable in two, but the green will be moved closer to the water. Water will also come into play more off the tee on 13 with players required to aim their drive towards the water in order to get the best



angle into the green. The 14th, a strong par three last year, will feature an exciting new green, while the fairway shapes and green complex on the par five 15th will also be more dynamic. However, it’s the changes to the par three 16th that Marsh believes will get both players and spectators excited.

“I have always believed that with tournament golf, or any golf course for that matter, it must build up to a crescendo,” says Marsh. “It’s nice to start off a bit gentle, but it should build up during the course of the round until you finally get to the last few holes. They should represent a challenge to see whether the player is up to the task – whether it’s playing to their handicap or winning a tournament. It’s important there’s an exciting finish.

“The 16th is an excellent change. We have been able to turn that into a genuine water hole. The water will move right up to the front of the green and the green will be shaped around it. It’s the only water body we will be touching during the reconstruction and due to the earthworks involved there we will be able to construct some gallery mounding around the green. I see 16 as a real gathering place for the tournament, a bit like the 16th at Augusta where there’s always that excitement when you get towards the end of the round.

Royal Pines’ tournament 10th was one of seven holes where new tees were added to lengthen the course by some 250 metres for the 2013 PGA Championship



Royal Pines’ 1.5ha of flat greens will be reduced in size and given more character under the new Graham Marsh redesign



◀ **Tim Palmer shaves the 9th fairway which played as a par four during the PGA. It will revert back to a par five under the new design with water coming more into play**

"On 17 we have been able to add another 30-35 metres to the length and on 18, which is a strong par four to finish already, the green will be a lot more dynamic and interesting. So I think we have achieved a strong and nicely balanced finishing stretch of holes which will sort out the men from the boys."

RACE AGAINST TIME

While on paper the changes look impressive, it will be once the first sod is turned when the race against the clock starts. With effectively just over nine months to work with, the time frame is tight and Queensland's fickle weather will no doubt at some point have its say on how smoothly works progress.

Although the involvement of the Royal Pines crew during the actual construction will be minimal, Coombes's focus will be keeping a very close eye on quality control, ensuring that sands depths are as specified and that there are no short cuts with the irrigation system.

"I don't want to be seeing contractors three months later fixing defects, because we simply don't have three months. Everything has to be perfect," states Coombes. "The ideal scenario would be to have the holes handed back with at least three months to go. That would give us something to work with, but it will all be weather dependent. Hopefully the tournament will be a little bit later this year, but as long as we have a good 6-8 weeks in between the last green being laid and the tournament we should be okay."

There is of course a contingency should the project strike any major hurdles which threaten the successful completion of all nine holes. The plan is to fully complete each hole as they go rather than opening up all nine holes at once. That means, for instance, if the weather does significantly impact and it's deemed too risky to continue, they can up stumps with x-amount of holes finished and revisit the schedule the following year.

At the time of this edition of ATM going to print the order of which holes on the front nine would be tackled first was still to be determined. Site access issues and the fact that the back nine has to remain open during the reconstruction, means some logistics still needed to be finalised, with Marsh saying that works could well start on the 9th and work backwards.

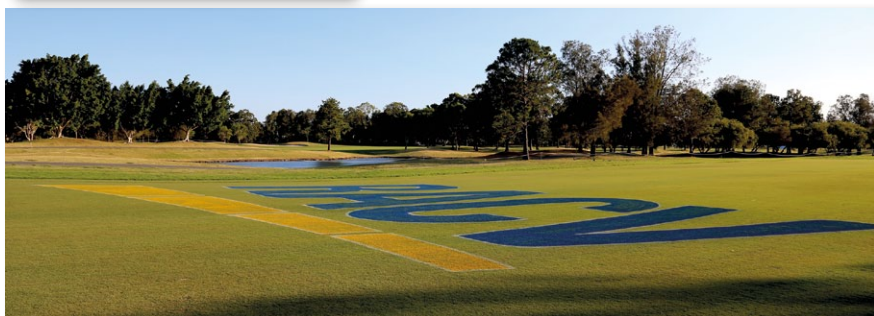
"Time will be the test," says Marsh. "We are going to need a very good run to get the whole nine holes done and everyone is aware of that. I don't have any doubt we'll get most complete, it's just a question of how many."

"It's a very unique project and one which has an enormous amount of challenges. With the new design we couldn't alter the flood modelling, which has been an exercise in itself, and then there are issues with acid sulphate soils out there which will have to be managed very closely. And then of course there are the unique agronomic aspects of the project such as the solid turfing."

"In a project like this it's all about the planning, about taking the extra time to try and cover all bases and I think the level of planning that has gone into this project, even to this stage, is probably far greater than what would go into a brand new golf course." 🌿

Below: Fairways were cut at 10mm with a 25mm step cut

Bottom: After all the issues with grass signs last year at Palmer Coolum Resort, this year's branding was much more appropriate



Graeme Halsall cuts the surrounds on the 12th green. The RACV Royal Pines tournament crew numbered 22 for the PGA

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Chris Dynes cuts the green on 6 West (Composite 4) ahead of the second round of the ISPS Handa World Cup of Golf. With two weeks of tournament conditions, the Composite Course held up superbly and again enhanced the club's reputation as a premier international tournament venue



brilli Back-to-back ance

Royal Melbourne Golf Club etched another chapter in its substantial history when it hosted the 2013 Talisker Masters and ISPS Handa World Cup of Golf in consecutive weeks last November. ATM editor Brett Robinson looks back on a rewarding fortnight for course superintendent Richard Forsyth and his tournament crew and the critical role they played as Australia went on to secure its fifth World Cup win.

It's the Royal Melbourne litmus test. Drop a ball above head height from the very back of the green on 6 West and watch where it finishes up. It's a sight to behold and when the green, rated as the hardest across the entire 36-hole complex, is in tournament nick it is one of the most unnerving prospects in the game of golf.

Royal Melbourne's greens are lauded the world over, but it is 6 West which almost invariably divides the pundits. Some believe it is sheer architectural brilliance, others folly. The green slopes from back to front and should you over-club and leave yourself above the hole or in the back bunker, you run the risk of watching the subsequent shot accelerating off the front, over the fescue approach before coming to a stop some 40 metres back down the fairway. Likewise, leave your approach short and the large false front comes into play and a similar fate befalls.

On the Friday morning before the second round of the ISPS Handa World Cup of Golf, Royal Melbourne East Course assistant superintendent John Mann stands on the highest point at the back of the green, playing as the 4th on the Composite layout, and performs the drop test. The ball eventually pulls up after 20m, just inches from that day's pin placement – perfect! Just one problem though – Royal Melbourne's American intern Chris Dynes, on greens mowing detail that day, has only cut half of the green.

Some 15 minutes later, as Dynes is parking the Flex 21 on its trailer, Royal Melbourne course superintendent Richard Forsyth stands in the same

spot as Mann and drops two Titleists. Again they track captivatingly down the slope, but this time pull up well past where Mann's ball had. A few more revolutions and bye bye ball. Then, just to prove how firm the green is, he throws one of the balls into the surface and catches it at calf height before contentedly striding off. Game on!

Presenting a golf course in peak condition is an art of walking a fine line and none finer is the one at Royal Melbourne. It's a badge of honour the club wears with pride and over the years the grand Suttons Mix complexes have developed a reputation as being among the firmest and truest in the game, confounding, punishing and torturing those professionals who would foolishly dare to think they can go straight at the flag. And none is more treacherous than 6 West.

Normal service was resumed at November's World Cup and as the greens started to exhibit their true fiery nature during the opening two rounds, Composite 4 (6 West) became compelling viewing. Bogeys abounded while for Denmark's Thomas Bjorn a four putt for a six was the only blemish in an otherwise fine opening round of 66. Two rounds later Welshman Stuart Manley, having just aced the 3rd (5 West), famously imploded with an 11, something that will no doubt haunt him on YouTube for years to come. The biggest indicator, however, that the 4th was proving a difficult prospect was the sheer number of divots where the Legend couchgrass fairway meets the start of the fescue approach, with many watching their second shot fall victim to the false front.



PHOTOS: BRETT ROBINSON

While 6 West is the sort of hole that makes even the best of the professionals question their ability, surely it would also provide some extra management headaches for a course superintendent. Not so according to Forsyth. As he is quick to point out, 6 West is really quite a straightforward prospect.

"I certainly don't lose any sleep over it (the 6 West green)," comments Forsyth. "We know what happens there. It's the most talked about green on the course, but the members know how to play it and the smarter guys work it out pretty quickly.

"It's simple – go for that left hand pin, the hero shot, and you have to land it in an area no bigger

than my office. There is a huge margin for error. If you pull it off you're rewarded, if not you're over the back in the bunker. If you're short, it'll roll 40m off the front. The smart shot, as any member will tell you, is to hit it to the right side of the green and take two putts. For me it sets up perfectly.

"As for how we manage the green during a tournament, the only thing we really do differently is the rolling, where we use a pedestrian roller instead of a normal ride-on. We don't water it any more, the cutting height is the same as the other greens, although we may only single cut on occasions. It's mainly the rolling because we know that if we put the ride-on roller on it the speed gets a bit out of hand relative to the slope. 5 West (Composite 3) is similar.

"You will see us dropping the ball from the back of the green and if it stops we know it's okay; if it keeps going we know we've gone too far. There's nothing scientific about it. The problem is that if you land on the green and the ball rolls all the way to the back, it can gather enough momentum to come off the front. If you've got it on the green and got it that far up we want it to stay on the green, but only just.

"There were probably a couple of times during the World Cup where we were two or three revolutions of the ball away from being borderline, but the wind wasn't strong and there was good grass coverage on the green. It's when it blows, or the grass starts to thin out and the green gets shiny, that's when you start getting problems."

KEEP CALM AND CARRY ON

While Forsyth knows intimately how far he can take his greens, trying to reassure tournament organisers everything is under control can often turn into a battle of wits. With the club wanting firmness and good speed to see the course play to its traditional character and tournament organisers often wanting to be conservative to avoid any potential suspension

CONTINUED ON PAGE 17



East Course assistant John Mann performs the drop test from the back of the 6 West green

The Royal Melbourne tournament crew celebrate with World Cup winners Jason Day and Adam Scott



PHOTO: GARY LISBON (WWW.GOLFPHOTOS.COM.AU)



West Course assistant superintendent Paul Thomas stimps the clubhouse putter

Example of the daily worksheets used by Thomas and Mann during the fortnight of tournaments

An example of the daily worksheets used by Thomas and Mann during the fortnight of tournaments

THE A-TEAM

As any course superintendent will attest, a quality assistant superintendent is worth their weight in gold. They are the superintendent's eyes and ears and are heavily relied upon to run the day-to-day maintenance operations out on course. Their role takes on even greater importance during a major tournament and while all the focus usually falls on the superintendent, the real work behind the scenes is the domain of the assistant.

Being a 36-hole establishment, Royal Melbourne course superintendent Richard Forsyth is fortunate to call upon the services of two assistants – **Paul Thomas** (West Course) and **John Mann** (East Course) – and it was their job at the recent Talisker Masters/ISPS Handa World Cup of Golf doubleheader to run the 50-plus tournament crew each day.

Both Thomas (38) and Mann (who turned 30 the day after the World Cup) both started at the course in 2005 and 2007 respectively as casuals and quickly worked their way up the ranks. They have worked under and alongside each other most of that time and as such have developed a close friendship. “We’re a bit like husband and wife,” laughs Thomas, a father of three. “Having worked together for a few years we have spent a lot of time getting to know how the other operates. We may have the occasional stoush over something but after half an hour we’ll come back and hug it out.”

So how do they pull everything together for a tournament? “Lots of coffee and Post-it notes,” jokes Mann as he looks over his desk which is littered with A3 printouts of the daily running sheets and yellow sticky labels. “For two blokes who are pretty forgetful, Royal Melbourne’s course operations wouldn’t function without Post-it notes.”

“The World Cup week was a little easier to manage as we had a bit of a template to work off from the Masters week and all we had to do was change the start times. We slaved over the Masters week runs for quite a while – getting the orders right,



making sure where the guys needed to be at certain times so they weren’t mowing adjacent fairways and ensuring we didn’t have machinery coming back through the field, so logistically it was quite a challenge. You’d take them home at night to double and triple check you hadn’t missed anything.”

“Every day we would sit down at about 2pm and nut out the running sheet for that afternoon/evening and also start on the following morning runs which we would complete that evening,” continues Thomas. “Then, as Richard loves to do, he’d throw a spanner in the works – putting an extra greens mower into the run, using the pedestrian rollers instead of the heavy rollers, double rolling, cross cutting fairways – so you’d get in at 3.30am the next day and have to start over again!”

“The first week was the hardest because of the early two tee starts and the logistics of getting everyone around ahead of the field. I think we had six or seven different runs for each of the guys.”

While it’s the rest of the crew that do all the leg work in terms of cutting, rolling and raking bunkers, Thomas and Mann are ever-present, ensuring that everything runs smoothly and dealing with any issues that arise. Armed with photocopies of the daily running sheets (and obligatory Post-it notes) they will alternate between the greens and fescue runs, checking that guys are on the right greens at the right times before doing one final sweep of each hole to check for quality.

All the planning they put into the event ultimately paid dividends and despite a few minor hitches (Mann somehow managed to bend the frame on a roller and break the belt on a tees mower!) the fortnight went off without a problem.

“There was a sense of relief when it was over but also a sense of achievement and pride,” says Mann. “To see all that work we did in preparing the surfaces up to six months out and then to be double cutting and rolling the greens and having them hard as a rock at 13’-14’ feet, and the plant is not even bothered by all that, was pretty satisfying.”

Concludes Thomas: “The highlight for me was seeing the guys getting nervous before they cut a green, a surround or tee. John and I have done a number of tournaments but we still get that knot in the stomach when it’s the first round. For some of the guys it was their first major tournament so to see them grow in confidence as the days passed and take pride in their work was great to see.”



Volunteer Ben Payne cuts the Composite 5 green

CONTINUED FROM PAGE 15

in play, it can become a juggling act with middle ground sometimes difficult to find.

Tournament officials and representatives from the US (Slugger White), European (John Paramor) and Asian Tours were on site for the World Cup, some of whom hadn't seen Royal Melbourne before, and as a result the additional scrutiny of the playing surfaces was pronounced. Together with Australia's seasoned tournament director Andrew Langford-Jones, Forsyth was a busy man, especially following the opening round where a few comments started filtering back from the players about how tough the conditions were.

"It was just a matter of reiterating to them (the Tour representatives) that we were in control of the situation and that we know these greens," explains Forsyth. "Royal Melbourne has had tournaments played in these conditions for years. Firmness, speed and wind are the three elements that are going to combine to give you problems and over the whole two weeks of the Masters and World Cup we didn't have a wind forecast above 30-35kph or that wasn't from the south.

"Sure, they were getting a little nervous on Friday with the firmness in the greens, but I felt we were well and truly in control all the time. But you have to remember they deal with aspects other than just the course – the players, the media who

are always looking for a headline. Andrew and his team worked well with us and were very supportive. We discussed preparation on a daily basis and adjusted things accordingly. Their pin selections were made with a lot of care and were appropriate for the conditions.

"Some of the comments on the Thursday and Friday from the players and officials were that the greens were 'right on the edge'. I don't like that expression and, really, what does it mean? Does it mean they were going to become unplayable? They were at their firmest, but they were never going to become unplayable, not in that wind. The scenario might have been different if we didn't get that 7mm of rain on the Saturday and Sunday; then we would have been having more 'regular' conversations.

"We knew we would be scrutinised and analysed a lot more during the World Cup and that certainly happened when the greens started to have that bit of fire about them. But as I told the crew, you can't present this golf course in its best condition unless there is that small element of controversy. You need that to show Royal Melbourne's true character."

CHANGING CONDITIONS

That the course did eventually show its true character at the start of the World Cup was pretty impressive especially given the hand that the weather had dealt. A cool, damp Melbourne spring had done little to assist Forsyth tapering the course for the start of



After greens cutting heights were dropped to 2.3mm for the final three rounds of the Masters, they were brought back up to 2.5mm for the World Cup. Pictured is Patrick Forsyth

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Royal Melbourne apprentice Luke Morgan cuts the tee on Composite 5. Tees were maintained at 7mm

its back-to-back run and to make matters worse on the day before the opening round of the Talisker Masters, during the full-field Pro-Am, the heavens opened and dumped 32mm on the course.

Up until that point Royal Melbourne's greens were right where Forsyth had wanted them in terms of their moisture and nutrition levels, however, the rain not only took the edge off their trademark firmness but also caused a significant flush of growth. As a result, cutting heights on the walk-behind greens mowers were dropped from 2.5mm to 2.3mm ahead of the second round and would stay at that height for the remainder of the Masters.

Despite very little in the way of drying weather – most of the Masters was played in the mid-teens (Sunday just barely cracked 20°C) and cool southerly winds – the greens had started to dry down and come the final round when headline acts Adam Scott and Matt Kuchar were going shot for shot over the closing holes, the greens, running at 13' on the stimp meter, started to dictate terms again.

With the Masters complete and Scott successfully claiming his second Golden Jacket, the tournament holes were given a brief respite from

TALE OF THE RMGC TURF

THE TURF

Greens were double cut on the same line with Toro Flex 2100 walk-behinds at 2.5mm, however for the last three rounds of the Masters they were 2.3mm. Greens rolled every day with either ride-on rollers or pedestrian rollers, with the exception of Friday (World Cup). The 4th was only rolled with a pedestrian roller throughout both tournaments. Greens were double rolled ahead of the final round of the World Cup.

The fescue surrounds were cut with Flex 21s at 7mm and to help protect them turning boards were used when cutting the greens. The Santa Ana/Legend tees were also cut with walk-behinds (Toro 1000s) at 7mm. The Legend couchgrass fairways were maintained by eight Toro 5610s (two teams of four led by Doug Challman and Nic Staff) at 12mm. Fairways cut mostly green to tee or cross cut.

THE BUNKERS

Bunker presentation aimed to provide a more rugged look compared to when the course was prepared for the Presidents Cup in 2011. While a lot of time was spent grooming and brushing faces for that tournament, this time the bunker faces were left natural to enhance the dark and light sand composition. More effort was put into raking the bases which were raked towards the pin, with the grooves running in the direction of play.

Overseeing the bunker crew for the two weeks was East Course foreman Craig Anthony. "I'm sure he won't want to go near one for the next six months," commented Forsyth in his address to the staff on the final day of the World Cup, "but the standard of presentation in the bunkers was fantastic and it was great the way he took that unenviable job on with passion and enthusiasm."

THE PERSONNEL

The Royal Melbourne links crew was supported by an additional 20 volunteers across the two weeks. Among those helping out



Bunkers were raked in the direction of play



Doug Challman notched up 40 years at RMGC

were Adelaide Shores course superintendent Tim Warren, Royal Queensland assistant superintendent Adam Mills, Horton Park turf technician Phil Newton and Lake Karrinyup spray technician Brittney Goldsworthy. Volunteers also came from Royal Auckland, Royal Canberra, The Dunes, Metropolitan, Keysborough, Patterson River, Kingston Heath, Riversdale and Freeway golf clubs.

THE WORKSHOP

Royal Melbourne turf technicians Luke Spertalis and Jeff Wesselon were again the stars of the show, having the machinery in peak condition for the two weeks. Preparations began as far out as six weeks servicing the clutches, brakes and steering boxes on the club's fleet of 28 Workman utilities and then grinding all cutting units in the immediate lead-up.

In between tournaments all cylinders and bedknives on the greens mowers were re-ground, as were the bedknives on the 11 fescue walk-behind mowers. All the walk-behind mowers, whether being used on the greens or surrounds, were fitted with Micro Cut bedknives so every mower could be interchanged at a moment's notice if necessary.

MILESTONES

The Talisker Masters/World Cup of Golf fortnight signalled the end of the line for Royal Melbourne's long-serving assistant superintendent of works Michael Love. Love again played a critical role overseeing all the tournament infrastructure build and movement around the course in the weeks leading up to the tournaments. Although finishing as a full-timer, Love will still remain at the club in a part-time capacity.

Groundsman Doug Challman (pictured above) also notched up a special milestone. Challman, who joined Royal Melbourne back in 1973, notched up 40 years at the club on 9 November and, as on many occasions at past tournaments, had the role of leading the fairway units during the recent events. Both Love and Challman were recognised for their years of service with a special celebratory dinner held in the Royal Melbourne clubhouse prior to the tournament.

cutting on the Monday. With temperatures starting to warm up – Tuesday would eventually get up to 30 – the greens and fescue surrounds were given an application of fungicide on the Monday, followed up the next day by an application of potassium to harden them off for the World Cup.

With cutting heights back up to 2.5mm and both the normal rollers and two pedestrian rollers in action, come the opening rounds of the World Cup the greens were at their peak in terms of firmness and speed. (Forsyth had brought in two 30kg pedestrian roller units which attached to the front of the club's walk-behind greens mowers specially for the events). As an indication of how firm the greens were, Jason Day's wedge shot into the 1st during his opening round landed five paces on before rolling right through the green and off the back.

Reacting to some of the player comments following the first round, the rollers stayed in the shed on Friday. Two greens did get cut, rolled, then stimped, however, with the speeds getting a little excessive the rollers were banished, while a couple were even given a quick handwater to take a bit of fire out of the ball reaction. Although disappointed at having to go down this path, Forsyth knew it would douse some of the criticism starting to emanate from certain quarters. On Saturday the rollers were back out, albeit just the two pedestrian rollers, but with 7mm of rain during that round and overnight, the edge was again taken off the greens.



With the Australian pairing of Jason Day and Adam Scott in prime position heading into Sunday, the rollers were out in force on Sunday. With the exception of the 4th, all greens were double rolled with the normal rollers in order to keep the speed and consistency in the greens right through to the end of the day – just long enough so that Day could collect the individual title and together with Scott secure Australia's fifth World Cup since 1954.

"The pleasing part about the whole two weeks was seeing how well the course and the turf held up and be challenging under all conditions –

Course superintendent Richard Forsyth handwaters Composite 5 (7 West) after the opening round of the World Cup

CONTINUED ON PAGE 21

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Above: Richard Forsyth (right) and turf technician Luke Spartalis hastily put together a spare tee marker after five were pinched by spectators during the World Cup Pro-Am

Right: Wooden miniatures of Melbourne's iconic W-class trams made for striking tee markers at the ISPS Handa World Cup of Golf



DING, DING! NEXT STOP, A SMACK IN THE HEAD!

Every tournament has its moments of madness and often for the superintendent it's the little things which can send them into a state of apoplexy. For Royal Melbourne's Richard Forsyth, normally very calm and considered when communicating with staff, it was the tee markers.

Corporate branding is such an integral component of tournament golf these days, especially in Australia where sponsorship has, in recent times, been difficult to come by. Every vantage point on the course is used and along with the traditional advertising hoardings around greens and tees, tee markers too have become another vehicle through which to get a sponsor's brand out there.

No longer does a bit of wood or plastic dome cut it. The Emirates Airlines sponsored Australian Open has for the last few years boasted miniature Airbus A380s taking off from wooden runway plinths, while at the 2011 Presidents Cup the tee markers were replicas of the tournament trophy. The recent Talisker Masters had cut outs of Talisker whisky bottles (why not real bottles?!), while the 2013 Gloria Jeans NSW Open had takeaway coffee cups!

Given November's ISPS Handa World Cup of Golf was being beamed to a global audience, Melbourne was literally on show and the Victorian Major Events Company, which played a significant role in securing the tournament, went to lengths to ensure every branding opportunity was taken.

As the main photo shows, a lovely (and weighty) set of wooden W-class Melbourne trams were crafted, a fitting tribute to one of the city's cultural icons. But it didn't end there. Some marketing whiz thought it a good idea to not only give each set of trams a specific route number (to coincide with Melbourne's current day routes), but also requested each route number be married up to a certain hole. So on the 1st tee you had, predictably, Route 1 (South Melbourne Beach to East Coburg) while on the 18th it was Route 112 (East Preston to St Kilda).

The idea was that during the tournament's international feed, TV commentators would be able to plug some of Melbourne's tourism hotspots. To assist the Ron Burgundy's of the golf world, a lengthy Excel spreadsheet was produced listing all the holes and their corresponding 'trams' as well as tourism features along each route.

Great notion, in theory, but try telling that to assistant superintendents Paul Thomas and John Mann who were lumped with the responsibility of ferrying the tee markers to their intended stops for each round. Not only did they have to get their heads around which trams went on which hole – the last thing they needed when marshalling the 50-plus tournament crew going about their morning preparations – there was also another issue.

During the Wednesday Pro-Am, five of the trams were thieved by spectators meaning they couldn't be put out too early during the tournament for fear of them being snatched (there were only 10 spares). As a result Mann and Thomas had to wait until the Tour set up officials were on each hole in question to drop the tee markers off, which often meant racing from some far flung corner of the property.

One thing that course maintenance crews universally possess is a sense of humour and it wasn't long before the trams became fair game over the 2-ways. "Ding ding!", "Who's the conductor?", "All trams are at their stations", "Trams heading back to the depot"... all harmless stuff. But it was after Mann let his frustrations with the tee markers be known over the radio that the boss 'intervened'.

The exchange – well, it was more a one way conversation – went something along the lines of, 'Would you stop whinging about the %&@#ing tee markers and just get them out there!' While certainly not Forsyth's proudest moment, it proved effective nonetheless and the trams were dispatched on time and without fuss for the remainder of the tournament. Ding, ding!



The Emirates A380 tee markers used during the Emirates Australian Open (top) and Presidents Cup markers used back in 2011 (above)

CONTINUED FROM PAGE 19

firm, receptive, fast and medium paced,” reflects Forsyth. “Considering all the wear and tear, divots, pitchmarks, spectator traffic and vehicle traffic, we held up really well and you couldn’t really tell we had two weeks of tournament conditions.

“Most of all, though I was really proud of the whole group, both Royal Melbourne staff and the volunteers, and how they tackled the two weeks with enthusiasm and the way everyone got along. That was very important. With the extra hours, extra pressure and scrutiny, I didn’t want it to become a drag. I wanted it to be enjoyable and I think overall it turned out that way.

“The Masters week was probably more demanding on staff simply because of the bigger field, the early two tee starts and the greater wear and tear on the course, but in terms of the focus and international exposure, the World Cup week was much more heavily scrutinised.

“The feedback from the players, media and Tour officials was really positive. We held two successful events and enhanced the reputation of Royal Melbourne as a premier international tournament venue and also that of the greenkeeping team.”

On a purely personal level, the highlight for Forsyth was seeing a dozen of the world’s best golfers playing in his back yard and being challenged by course which, despite being short by



modern standards, has remained true to its design and is still a tough test of golf. Day’s winning total was 10-under, while just 14 of the World Cup field of 60 finished even par or better.

“Golf commentator John Huggan wrote a great article ‘Australia: Home of (interesting) golf’ in which he wrote that courses in Australia, like Royal Melbourne, would have to be the most interesting place to watch professional golf because of the different challenges they present. It’s not just a driver and then five iron to within a foot of the hole.

“I like hearing the players say that they have to think about every shot, that they just can’t blaze away. I like to see the players having to use their imagination if they’ve wrong-sided themselves and use the slopes to get the ball to feed to the hole. I also like hearing the players’ comments that compare the conditions and course conditioning to a Major or what they deal with at Augusta.”



Above left: Lake Karrinyup’s Brittney Goldsworthy was one of 20 tournament volunteers across the two weeks

Above: Apprentice Rowan Godwin cuts the fescue approach on Composite 18. Approaches and surrounds were maintained at 7mm

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◀ **Peak hour traffic on Composite 11 (1 East). Eight fairway units tended to the Legend couch fairways before each round**



The World Cup signalled the end of Michael Love's time as Royal Melbourne's full-time assistant superintendent of works



Above: Some precision steering on behalf of Clint White

Right: Composite 12 (2 East) which would later that day see Adam Scott score a horror 9

FROM DENMARK, WITH LOVE

Perhaps the final word on Royal Melbourne, however, should go to Thomas Bjorn who summed up best what makes the sandbelt icon so special. Eventually finishing runner-up to Day with a four round total of 8-under, it was in the press conference following his opening round 5-under where he heaped the ultimate praise on the course.

"This golf course in itself is fantastic, but the condition of it is just perfect because it demands so much of you," the then world No.44 stated (Bjorn would go on to jump up 10 spots on the Official World Golf Ranking as a result of finishing second). "You can have a six-foot putt and it's impossible and you would rather be 40 feet on the other side of the hole. You have to know where the flags are and just never, ever shortside yourself because you won't get up and down. The greens were fantastic today and considering that there was a golf tournament on this course last week, these greens are as good as they come.

"There's so many things that can go wrong on this golf course. You have to keep yourself out of trouble and play some smart clubs off the tee and try and hit a lot of fairways and hit the middle of the green. Sometimes you stand with wedges and 9-irons and you are hitting 20-30 feet away from the hole. But that's Royal Melbourne for you. I think

it's as close as you'll come to links golf. It's a very patience-testing golf course.

"When you are 42-years-old like I am now, it's not every morning you wake up and think 'I am going to go and play golf today'. But when you are going to play Royal Melbourne you get excited. It is, in my eyes, probably the finest golf course you can ever play... and I could play here every day for the rest of my life."

EDITOR'S NOTE

As an addendum to the discussion on the 6 West green, just a few weeks after the World Cup it underwent some minor contouring changes. Already planned well in advance of the November tournaments, renowned course architect Tom Doak, along with expert shaper Brian Slawnik, were on site during the second week of December to oversee the works.

The main thrust behind the works was to increase the green's pinable area and also soften the slope and runoff coming out of the back bunker. To achieve this, the green, approach and surrounds turf was lifted and the underlying thatch layers removed. Upon completion of the contouring adjustments, the greens turf was re-laid along with 1000m² of new fescue and was back in play at the start of January.

"It was identified that a few things have changed and evolved over the years on that green compared to the first contour plans we have on file," says Forsyth. "We haven't changed anything other than reinstating what we think was there previously. We have reduced the sand build up on the bunker edge so that the slope isn't quite as severe coming out of the back bunker. We have also broadened the pinable area on that left hand side so we can share the wear across the green more evenly."

As well as the work on 6 West, the Royal Melbourne crew has also rebuilt tees on 12 and 15 West, reinstated 2000m² of fairway left on 4 West, widened the 18 West fairway, constructed a new 19th hole and a new chipping warm-up facility – never a dull moment! 🌱





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The Royal Sydney Golf Club tournament crew, which numbered over 60, celebrate following the completion of their final round preparations at the 2013 Emirates Australian Open

Although held just a week apart, the conditions experienced by course superintendents Martyn Black and Steve Marsden for the 2013 Gloria Jeans NSW Open and 2013 Emirates Australian Open last November couldn't have been more contrasting. ATM editor Brett Robinson looks back at the two tournaments held at Castle Hill and Royal Sydney.



Martyn Black didn't need any more convincing to get the hell out of Dodge. Out changing holes in between the rain-affected second and third rounds of the 2013 Gloria Jeans NSW Open, a lightning bolt slammed into the 13th hole of Sydney's Castle Hill Country Club no more than a few hundred metres away from where he was working.

Being a smart bloke despite his advancing years, Black was nimbly back behind the wheel of his utility and making a mad dash for the sheds. By the time he was drifting into the safe confines of the maintenance compound, another of Sydney's infamous storms had descended in biblical proportions and for the fourth time in two days play was suspended.

Over his 24 years as superintendent at Castle Hill, Black has developed more than a modicum of respect for the power and beauty of Mother Nature and has had cause to curse her many times for laying ruin to his course. As is Murphy's Law, the worst of the weather always comes at the most inopportune time and so it proved when, for the first time in the club's history, it hosted the revitalised NSW Open from 21-24 November.

No less than seven inches of rain fell on Castle Hill in 11 of the 15 days leading up to and during the

tournament itself, throwing Black's intended course preparations out the window. The first major dump (39.5mm) occurred on the Monday of the week prior to the tournament and was followed during tournament week by falls of 18mm (Wednesday), 22mm (Thursday), 15mm (Friday) and 32mm (Saturday).

Despite five weather delays during the tournament, remarkably 72 holes were completed (the final round didn't tee off until 9.45am on Sunday due to only four groups completing their third round by the end of Saturday) with Aron Price going on to shoot a tidy 19-under total of 269 to claim the trophy by four shots.

"It was certainly one of the more challenging events we have had and we dodged a few bullets along the way," says Black. "Given the conditions and not being able to do exactly what we wanted to do, the course presented remarkably well. I was sitting in the shed after that electrical storm on Saturday thinking it would be reduced to a 54-hole tournament, but we got through."

"We really wanted the tournament to be a success for the members and they were rapt given the conditions we had to deal with. It was the first major event we have had here since the Canon Challenges and the whole club got behind it. The



PHOTOS: BRETT ROBINSON

feedback has certainly been positive and hopefully we'll see it back here again next year."

AN OLD LADY CALLED ETHYL

That spell of wet weather during the tournament was in stark contrast to the conditions experienced across Sydney and NSW in the months beforehand. Hot, dry and windy conditions in September and October sparked some of the worst bushfires NSW had seen in decades and for Black it meant some nervous times as he watched his 80 megalitre irrigation dam between the 17th and 18th holes drop to levels not seen before.

Despite receiving 900KL a day from the local treatment plant, Black was pumping out 2ML a day to keep his kikuyu fairways, Santa Ana tees and bentgrass/Poa greens alive, effectively meaning the dam was dropping 1.1ML a day plus evaporation. So low was the dam that at one stage Black stripped off and jumped in to see how much there was between the floating pump and the dam floor.

All that changed, however, come the tournament and the wet conditions that prevailed undid a lot of the good work that Black and his crew had instituted in the lead-up to the event. Having talked the tournament organisers around to increasing green speeds from the initially requested 9.5 to 10.5,

the resulting rain meant Black struggled to get the greens stimping at 10 all week.

With weather delays throwing the playing schedule into disarray, two tee starts at 6.30am were necessary on both Saturday and Sunday, meaning greens were only given a single cut at 3mm. And in what Black is claiming as some sort of record, the wet conditions meant he didn't mow fairways at all over the four days.



The Open was Steve Marsden's first since taking charge at Royal Sydney in December 2012

Castle Hill superintendent Martyn Black literally gets his hands dirty clearing out a drain following one of many torrential downpours that caused disruption to the Gloria Jeans NSW Open in November. Providing Black with some 'helpful' advice is club captain Lindsay Verdon



PHOTO: BELINDA HILL, PERCEPTION PR

Scott Marr (left) and Matt McKay give Royal Sydney's 13th green an additional cut ahead of the final round. Rollers were kept in the sheds all week with green speed manipulated by daily cutting regimes



The very fact that Castle Hill held up so well under the conditions and that a full complement of 72 holes were eventually played, came down to four things. First, despite the torrential rain and accompanying electrical shows, Castle Hill was spared the destructive winds and hail that are often the calling card of such fronts. Just in case, however, Black had 10 greenkeepers from nearby golf clubs on standby to assist with any clean-up.

Castle Hill's sand link drainage system, installed in stages over a number of years, as well as the installation of geofabric in all of the course's 72 bunkers over the past four years, also came into their own. Despite the heavy rain, water was able to get away quickly off the fairways and aside from a few small pockets of erosion on some bunker faces, they were quickly back in play too. The real star, however, according to Black was the plant growth regulator Primo.

"As I joked to some of the guys who asked me whether I had much help during the tournament, I told them I had a couple of casuals; three blokes – the Tri-man, Nexy and Pac-man – and a little old lady called Ethyl – trinexypac-ethyl," laughs Black.

"Primo saved the day and without it we would have been in deep trouble. Its ability to sit the kikuyu down and stop it running rampant meant we were able to have the fairways in such good condition without having to mow.

"I was very keen to get the Primo on before the tournament and we were lucky to get it out on the Friday before the rain started. We hit the fairways pretty hard at 2.5l/ha along with 20l/ha of Greenmaxx and that stopped the kikuyu in its tracks.

"Obviously we couldn't mow anywhere near what we would have liked, but in saying that I wanted to do the tournament as sustainably as possible. I didn't want to mow fairways just for the

Course preparations kicked off at 4.30am. Pictured receiving plenty of attention is the par five 2nd



fun of it and you don't need to when you've got the Primo on and the ki's that tight.

"I fully intended to mow on the Tuesday before the practice round, but the place was still really wet. We ended up going out that afternoon because if we didn't the forecast wasn't looking good and we would have got into trouble. That was the last time we cut the fairways until the last group had finished on the Sunday! Despite that length of time the ki was still sitting there beautifully."

PERFECT TIMING

While the rain created all sorts of headaches for Black, across the harbour at Royal Sydney Golf Club his counterpart Steve Marsden was rubbing his hands with glee. The four inches of rain that fell on the Rose Bay course in the two weeks leading up to the 2013 Emirates Australian Open couldn't have been timed better.

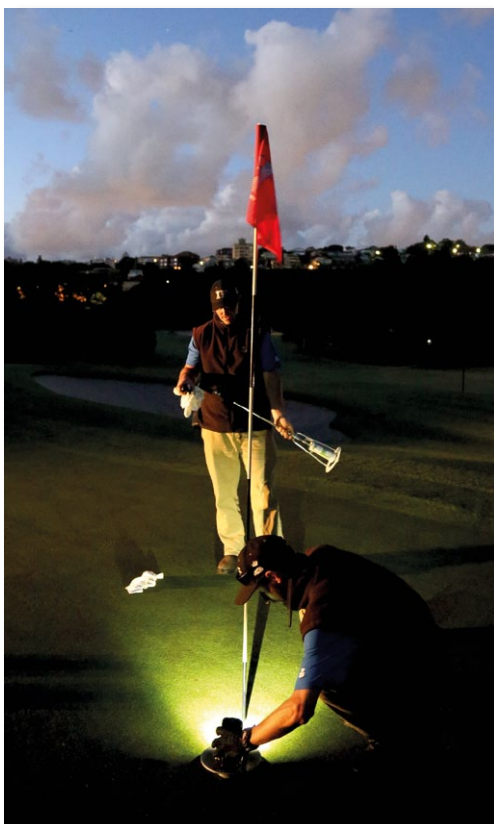
Like Black, Marsden had also been keeping a wary eye on watering regimes during that hot run of weather, but the timely rain freshened the course up perfectly and ensured Royal Sydney was looking at its best come the opening round of its 14th national Open on 28 November.

The Open closed out a spectacular four week run of tournaments Down Under and right up until the 72nd hole at Royal Sydney the drama didn't abate. With the Masters and PGA titles already under the belt, Adam Scott opened up his Triple Crown tilt with a course record of 10-under and come the final hole had a one shot lead over Northern Irishman Rory McIlroy who he had been duelling with over the previous two rounds.

Marsden, along with many of his tournament crew, were among the thousands of spectators crammed around the magnificent 18th green at Royal Sydney expecting to watch Scott make history. Earlier that day as Marsden had sent the crew out one final time at 4.30am, there was a definite air of excitement that something special was about to happen, but some 12 hours later it was McIlroy holding aloft the Stonehaven Cup in front of a stunned, albeit appreciative, crowd.

"Obviously it wasn't the finish all of Australia wanted, but you have to take your hat off to McIlroy who stuck in there and made that great putt," says ex-pat New Zealander Marsden who took over at Royal Sydney in December 2012. "It was a bit of a hollow feeling to see Scott lose it right at the end, but all in all it was a great event and the duel between those two really captivated a lot of people's interest. The feedback has been very positive from the event itself and we have had a lot of emails from members who were very proud of how their club was presented.

"From our perspective, the team worked really hard in the lead-up to and during the tournament and I am thrilled for them as they put in so much effort to have the golf course and landscape areas in top condition. Being my first Open I really enjoyed



the experience and I learnt a few things during the week which will put us in good stead should the tournament come back."

ROLLERS IDLE

While the fairway units remained in the sheds at Castle Hill during the NSW Open, at Royal Sydney it was the rollers that would remain idle throughout the tournament. Although he would love to have rolled, Marsden, working closely with tournament director Trevor Herden, had to be mindful of Sydney's fluky weather and as such relied on manipulating daily cutting regimes to get the desired green speeds.

The Penn G2 greens were cut at 2.6mm for the week with some greens being cut up to five times a day. In the morning, greens were stimped after their first cut and depending on where speeds were at they were either left, given a second cut and on some occasions even a third. Greens were also double cut following each round.



Royal Sydney's Penn G2 greens were maintained at 2.6mm for the Open

Royal Sydney foremen Adam Marchant (standing) and Alistair Dunn set the pin on the 4th early on the morning of the final round



Scott Douglas (left) and Solomon Faingaa go head-to-head on the 3rd

Royal Sydney's new Jacobsen seven-gang LF4677 fairway units in action on the 13th



Patrick Haydon stimps the 2nd green after its first cut ahead of the final round. Green speeds were very consistent with a six inch spread across all 20 greens

Aaron McMorow cuts the 13th tee. Tees were kept at 8mm for the tournament



"We would have liked the greens a bit quicker on the Thursday and the Friday, but certainly by Saturday and Sunday they were much better as the wind abated," reflects Marsden. "But we were very pleased with the consistency of the greens and had about a six inch spread across all 20 greens (the 18 on course and two practice greens).

"We would have loved to have rolled them and have them 13 on the Sunday. That would have been a nice place to be and the greens themselves would have handled that no problem, but the wind was the biggest influence on where those greens speeds were and they (the tournament organisers) didn't want the event compromised, so they erred on the side of caution."

One of the challenges Marsden faced with the greens in the lead-up to the Open was the influence of *Poa annua* in some of the greens. With some greens containing up to 50 per cent *Poa*, the inevitable issues with consistent ball roll was forefront in Marsden's mind for the tournament, but at the same time he had to be mindful of how hard to push his control strategies in the months beforehand.

Following greens renovations (late August), Marsden went out with two applications of paclobutrazol three weeks apart towards the end of September and started on the Primo at the beginning of November. Around that time he also instituted an intensive grooming regime on the greens using grooming units fitted to the club's new fleet of Jacobsen 122 handmowers, as well as having a team of five guys hand-brushing greens.

The grooming worked a treat and Marsden was able to manage the canopy better and get a much tighter, finer surface as a result come the tournament. Marsden also believes that the cycle of the *Poa annua* was tailing out in regards to the amount of seed being produced which also helped.

SHIFTING SANDS

Bunker presentation and playability was also another area of scrutiny during the tournament and instead of raking it was decided to broom both faces and floors. Marsden explains: "With the sand here being a very fine dune sand, we felt we got the best finish by just hand brooming the faces and bases rather than raking them. We boarded the bunkers at the end of play each day so the floors were levelled out and then in the morning we just broomed them to get a better finish.

"It was interesting to hear some of the commentary over the weekend where they were talking about the amount of sand in the bunkers. I think it wasn't so much to do with what we've put in them, but a reflection of the sand itself, the way that it plays and the fact that you're sitting on a dune system. We also had some sand movement caused by the wind, particularly on the faces in a couple of locations.

"The bunkers at Royal Sydney are a true hazard and are a major part of the golf course's defence. They're always a challenge whether playing from them or maintaining them. So much emphasis is put

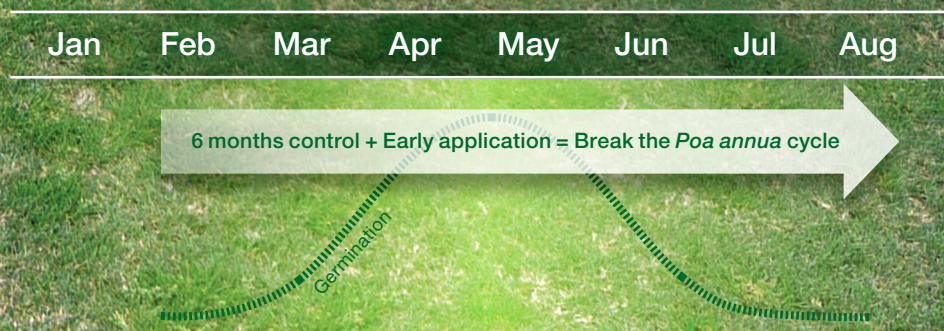


CONTINUED ON PAGE 30

Treat early to break the *Poa* germination cycle

Poa annua is a prolific seed producer and the diversity of its bio-types makes it notoriously hard to manage. Judging the correct application timing is crucial and it can be impacted by the environment as well as autumn renovations. BARRICADE Turf Herbicide offers long consistent residual control of up to 6 months with a single application.

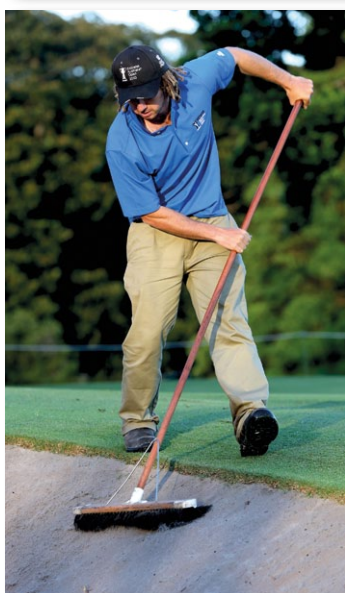
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Clint McGrath navigates his way between the bunker complex surrounding the 6th and 9th greens



Patterson River 21C Mark Harkness was one of 22 volunteers to assist during the week. Bunker faces and floors were broomed due to the fine dune sands of Royal Sydney's hazards

CONTINUED FROM PAGE 28

on bunker presentation around the world at major events and the players now get pretty comfortable in the bunkers, but they certainly weren't able to get too comfortable during the Open."

FULL HOUSE

Marsden opened the doors up for his first Open with his links crew of 45 welcoming a further 22 volunteers for tournament week. Among them were NSW superintendents Dan Cook (Elanora CC), Matthew Fealy (Charlestown GC), Nathan Reynolds (Morisset GC) and former superintendents turned Nuturf territory managers Paul McLean and Craig Paget.

While the maintenance facility was bursting at the seams, Marsden also had a full house at his home adjacent to Royal Sydney's 1st green. Former Lakelands Golf Club colleague Darren Moore, who is now based out of Shadow Creek in China, returned Down Under to volunteer and brought with him his assistant YaoHu Wang, who affectionately became known as 'Yahoo' for the week. They shared some floor space with fellow volunteers and two of Marsden's countrymen, former NZGCSA president and now PGG Wrightson turf manager



Have brooms, will brush

Grant Bunting and Cape Kidnappers pro shop attendant Carlos Butcher.

One of the more interested volunteers on the crew, however, was The Australian Golf Club course superintendent Phil Beal. The Englishman will be in Marsden's boots come this December when his club hosts the 2014 Australian Open, its first since 2007 and first since the significant course overhaul under the auspices of Jack Nicklaus during 2012 and 2013 (see ATM Volume 15.3 – 'The course that Jack rebuilt' for Beal's comprehensive article outlining the many changes made).

"We had a terrific group of volunteers and they all contributed immensely," says Marsden. "It was great to be able to share the experience with them and see them work in well with the Royal Sydney crew. It was great to have the calibre of the other course superintendents here for the week to bounce ideas off one another and get input, which is one of the neat things about our industry."

"I guess for Phil it was all about seeing the set-up of the event itself and what we had done in the lead-up to the event, so hopefully he got some benefit out of it for next year. It will be a little bit different for him as he has some beautiful new greens so he won't have some of the challenges we had with the *Poa annua*."

BATTLE RESUMES

With the spotlight of the tournament now off, Marsden is looking forward to knuckling down and refocusing his efforts on improving the Royal Sydney playing surfaces. Despite having achieved a lot in his first 12 months – greenside bunker refurbishment, an intake of new machinery and altering maintenance regimes to improve efficiencies – one of Marsden's primary goals now is to start reducing *Poa annua* percentages in the greens.

"The focus now is to improve the turf quality on the golf course for the members and to enhance some of the landscape areas," says Marsden. "Now the tournament is over we can really start to look at how we manage the *Poa* population and implement some strategies to turn the percentages around in favour of the creeping bentgrass."

"The *Poa* percentage varies. Some greens are very low while others are as high as 50 per cent. With the tournament we couldn't go too hard with our control strategies, but now we'll start back on the paclobutrazol and have got a couple of trials planned over the summer to see what works." 🌿



Royal Sydney head turf technician Ian Widocks hard at work during the tournament

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TM



Gardiners Run has 9653m² of tees with each hole generally having three separate tee areas approximately 150m² in size

Teeing off

In the third part of an ongoing series on the construction of a new golf course, Gardiners Run course superintendent Alan Greatorex looks at tee, fairway and bunker construction.

Tee bases were roughly shaped during bulk earthworks stage and with the accuracy of GPS minimal final trim work was required

Over the past two editions of Australian Turfgrass Management we have looked at the new Gardiners Run Golf Course development in Melbourne's north-eastern suburbs. As well as providing an overview of the project, which has seen Chirside Park Country Club sell part of its existing course to fund a new 18-hole championship course designed by Pacific Coast Design, we have also focused on some of the specifics of constructing a new golf course.

In the last edition (Volume 15.6 – November-December 2013) we looked at the construction of two integral components golf course maintenance operations – the maintenance facility and irrigation system. In this edition we head out on to the course and focus on the major playing areas – tees, fairways and bunkers. The next edition, which will come out around the opening, will focus solely on greens construction and the final tie in work that is needed ahead of the grand unveiling.

TEES

Gardiners Run has 9653 square metres of tees with each hole generally having three separate tee areas. These are predominantly oval shaped and are approximately 150m² in size. Each tee consists of a compacted clay base and shaped with a V in the middle at a slope of five per cent, with a drainage line down the middle of the V from back to front.

Drainage aggregate is added around the pipe and to a depth of 100mm, then the specified sand is placed over the top at a depth of 250mm. Infiltration rates between 100mm-150mm per hour and particle size distribution similar to a greens sand has been used.

Tee bases were roughly shaped during the bulk earthworks stage of construction and once again the accuracy of utilising machinery fitted with GPS meant minimal final trim work was required. No shortage of suitable clay (as mentioned in previous editions the new course is located on an old CSR clay tile quarry) allowed for a firm compacted base for the drainage and sand layer to be added.

Generally, the flow of construction was:

- Bulk earthworks and base shape;
- Drainage installation in conjunction with irrigation installation;
- Sand placement on top once sprinklers are up and running;
- Surrounds of tee complexes topsoiled and planted;
- Adjoining cart paths constructed;
- Amendments added and final planting of tee tops.



All tees were planted with Santa Ana couchgrass sprig at a rate of 0.125 cubic metres/100m² with a one per cent finished slope directed into the golf course and away from boundaries. The majority of tees are slightly elevated and surrounded by a mulch garden bed planted with *Poa labillardieri*. Walk on areas from cart paths are generous to help distribute wear and not too steep for easy access.

BUNKERS

The new course will feature 65 bunkers which equate to approximately one hectare. Bunker construction requires that bulk earthworks are finished to a point where design contours in the surrounding areas are completed to then allow for the bunkers to be excavated to subgrade level. Greenside bunkers are generally constructed at the same time as the adjacent green.

The final contouring around the bunkers is such that no major flows of water enter the bunker. This is achieved by diverting water with subtle swales around the bunkers to direct the major flow away.

Once again there was no shortage of clay for a firm base with drainage lines throughout the entire bunker, from back to front as well as a drain line along the bottom of the slope or face of the bunker. The slope or face area of the bunker is lined with Sandmat liner and the floor or base of the bunker is lined with a geotextile material. This material is slashed where it is placed over drainage lines to prevent any future sealing of material. Sand depth on average is 200mm on the base and 100mm on the faces.

Once the basic subgrade is in place with drainage trenches dug, the edge of the bunker is pegged with 100mm timber boarding which allows for topsoil to be placed around the area and Santa Ana sod approximately 1m wide to be laid around the entire perimeter and on any peninsulas or islands.

Sand placement is one of the last construction tasks to occur with the bunker edge boards remaining in place for as long as possible so that the surrounding sod can take root and stabilise the area as much as possible.

The selected sand for the bunkers is a grey 'Keysborough' mix from Burdetts with an adequate infiltration rate and a good particle size distribution allowing the establishment of a firm face that will not plug or bury and feed balls back onto the floor of the bunker.

FAIRWAYS AND ROUGH

Gardiners run comprises 21ha of Santa Ana fairways and 22ha of common couch/Santa Ana roughs. Most of the fairway and rough areas are shaped during the bulk earthworks stage and once again the accuracy of utilising GPS can easily make allowances for sand/topsoil capping of these areas.

The fairways have been sand capped to a depth of 200mm with a combination of the imported



Keysborough sand and a Burdetts sand. The Keysborough sand has been used in the first section of the fairway from tee to approximately the 150 metre mark (considered a lower traffic area) and the remainder of the fairway (high play areas), including green surrounds, has the Burdetts sand.

Site topsoil has been used for primary and secondary rough areas. Some contamination did occur from site topsoil rough onto fairways but this was controlled with silt fencing and the ability to subtly change surface contours to deflect water towards drainage pits.

With the variability of the three different soil types, this dictated the style of drainage system best suited to each area. The free draining sand on the fairway areas has allowed for a combination of slotted ag drainage in conjunction with solid carrier pipes, surface pits and surface contouring to remove water as quick as possible.

In the remaining areas where the infiltration rate is slower, a combination of surface pits and solid carrier pipes have been used. Careful consideration was given to the placement of each soil type in relation to where cart paths and golf traffic feeds onto the fairways. Generally paths have been directed onto higher elevated areas of Burdetts sand with multiple exit points from cart paths onto fairway areas.

Being situated on an old clay tile quarry, there was no shortage of clay for a firm base with drainage lines throughout all bunkers

Bunker faces have been lined with Sandmat and the floors with a geotextile material





Above: The new course will feature 65 bunkers

Right: Densal used a crusher bucket on an excavator to shred the delivered rolls of Santa Ana couchgrass prior to sprigging on tees and fairways



The time it took from shredding the turf and incorporating the sprig into the profile was kept to a minimum which has resulted in an excellent strike rate on all fairways and tees. Now it's just a case of watching the grass grow with Melbourne's famous weather having the final say in how quickly that happens!

LANDSCAPING

With the Gardiners Run site being a former quarry, a substantial landscape planting programme has been undertaken to enhance aesthetics and give the site a solid natural look. In addition to the 40,000m² of existing trees primarily around the boundary of the course, the following plantings have been/will be incorporated across the site:

- Blackwood (*Acacia melanoxylon*), Buxton gum (*Eucalyptus crenulata*) and Yarra gum (*Eucalyptus yarraensis*) – 18,000 tube stock;
- Tussock grass (*Poa labillardieri*) – 83,000 plants (primarily around tee areas). 🌱

The free draining sand on the fairway areas has allowed for a combination of slotted ag drainage in conjunction with solid carrier pipes, surface pits and surface contouring to remove water



Fairways have been sand capped (200mm) with a grey Keysborough sand used in the first section of the fairway (tee to about the 150 metre mark) and a Burdett's sand used on the remainder of the fairway and surrounds (high play areas)



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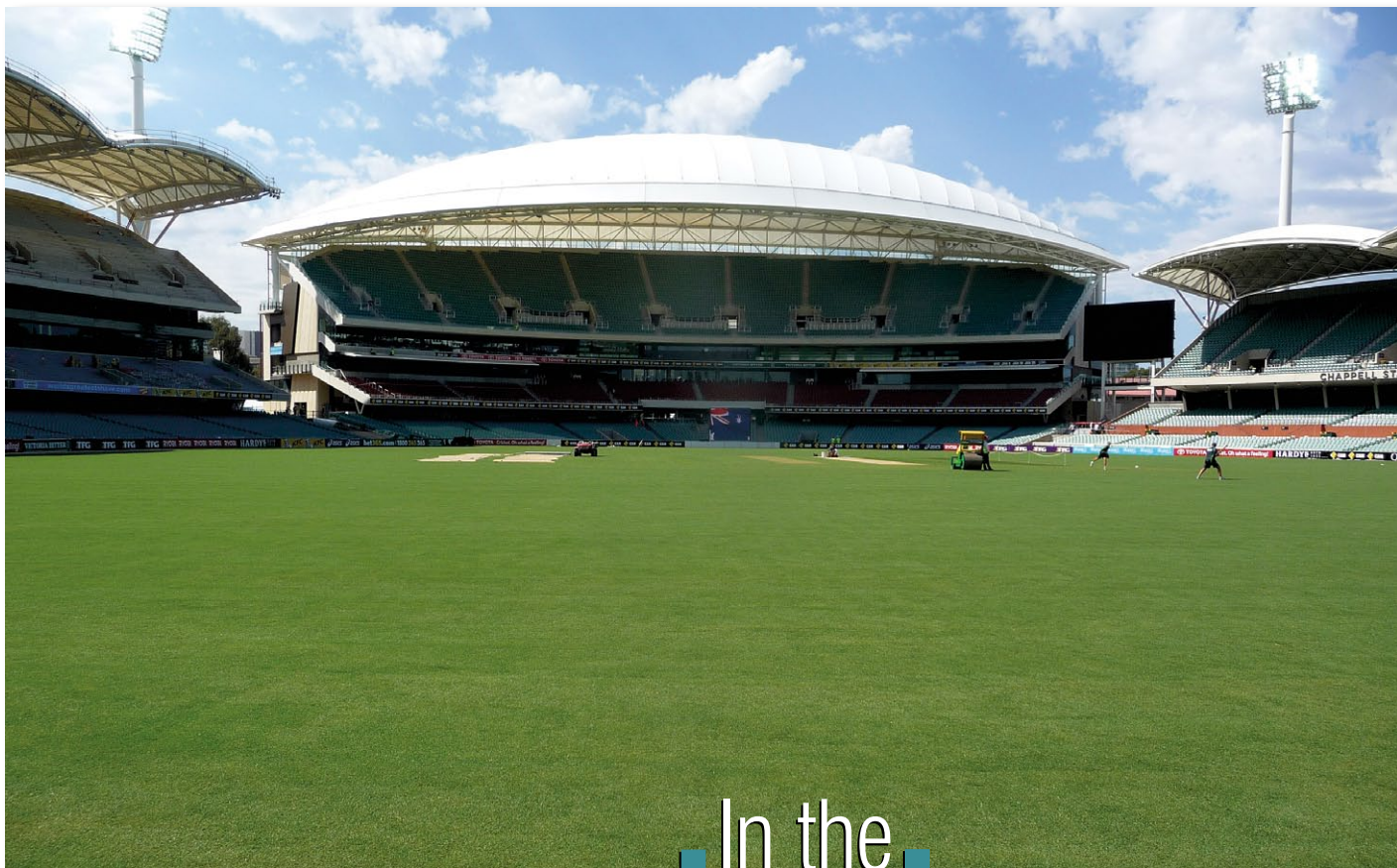
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In the major league

In this instalment of AGCSATech Update senior agronomist Andrew Peart looks ahead to the 2014 AFL season and some of the challenges that the likes of the new-look Adelaide Oval and Sydney Cricket Ground will face in the lead-up to hosting their opening games.

The Adelaide Oval will likely be one of the most talked about venues this coming AFL season after its recent transformation into the city's new home of football. It will host its opening premiership game on 29 March just a week after a Rolling Stones concert officially launches the new-look arena

In late October 2013, the AFL released its draw for the 2014 season. The new season contains a number of new initiatives including all teams having two byes (and therefore having to start a week earlier), an ANZAC Day triple header, as well as new venues being played at for the first time.

In addition to changes to the Premiership season, there are also a number of significant modifications to the pre-season competition. Gone is the NAB Cup normally held over three weeks and culminating in a grand final between the two best placed teams. Instead, this year will simply see two rounds of practice matches known as the NAB Challenge to be held over 18 consecutive days from 12 February to 1 March, all televised live on Foxtel.

The venues for the NAB Challenge matches are again spread far and wide across Australia, utilising WAFL and SANFL grounds in Perth and Adelaide as well as major regional venues such as Alice Springs (Traeger Park), Townsville (Tony Ireland Stadium), Wagga Wagga (Robertson Oval) and Launceston (Aurora Stadium). Victoria has four venues hosting matches – Etihad Stadium, Simonds Stadium (Geelong), Eureka Stadium (Ballarat) and Wangaratta Sports Ground.

Once again Manuka Oval in Canberra (now called StarTrack Oval) will host a match, however, this year it will be the first time AFL is played on the

newly laid surface. The redevelopment of Manuka in the latter half of 2013 has resulted in a seven wicket table being installed to replace the old five wicket strip. Due to the length of the old table though, the actual area of the wicket table is not much greater than previous.

The old common couchgrass and perennial ryegrass outfield has also been ripped up and replaced with Grand Prix couchgrass which will be oversown with ryegrass for the football season.

The venues in Perth (Joondalup Oval) and Adelaide (Richmond Oval) are home grounds to West Perth Football Club and West Adelaide Football Club respectively and will be hosting NAB Challenge games for the first time. Both venues already have their respective state-based teams training there along with local American football (gridiron) competitions being played on the grandstand side of each ground.

It is not uncommon for regional venues to host other activities on their grounds over the summer months and not just cricket. Along with American football, other events can include the local Show (including horses), running events such as the local Gift or, in the case of one of the proposed NAB Challenge venues, sheep dog trials (thankfully that event has subsequently been moved to a different venue).

Ideally it is best that no additional activities at venues be held in the lead up to NAB Challenge games, however, unfortunately this is not possible. Venues such as Traeger Park, Tony Ireland Stadium, Manuka, Blacktown International Sportspark, Wagga Wagga and Wangaratta will all host cricket matches prior to and in some cases after NAB Challenge games are played. None of these venues have drop-in wickets meaning the management of the wicket table is crucial.

For footballers, wicket tables are undoubtedly the most scrutinised and contentious part of any football ground and pose the greatest challenge for curators in the lead up to hosting these pre-season games. Monitoring moisture levels to ensure the wicket is not too hard and rotating usage to ensure the wickets have adequate grass coverage are two of the most crucial aspects, as well as ensuring there is a gradual transition in terms of heights from the outfield to the table.

PREMIERSHIP SPOTLIGHT

The 2014 season will see two 'new' venues used to host AFL Premiership matches. Last year was the first time AFL had been played at an overseas venue, namely Westpac Stadium in Wellington, New Zealand, which will again host another ANZAC Day match, this time between Brisbane and St Kilda, as part of league triple header. This year will also see first games played for Premiership points at Traeger Park (Alice Springs) and the new-look Adelaide Oval.

AFL has been played regularly at Traeger Park for many years in the form of NAB Cup and NAB Challenge matches, but this year Melbourne will host Port Adelaide in Round 11 on 31 May. Traeger Park came to prominence recently when it hosted the English cricket team in a two-day exhibition game against an ACB Chairman's XI. While cricket and football generally don't mix, the surface quality of the outfield was impeccable following the cricket match.

The most talked about venue this season, however, will undoubtedly be Adelaide Oval. The Oval has undergone a dramatic transformation over the last 12 months which has seen the demolition of the old Bradman Stand at the southern end of the ground and the Chappell stands on the eastern side. Both have been replaced with much larger, modern stands while areas of the western stands, constructed in the initial upgrade of the oval, have been named the Sir Donald Bradman Pavilion (centre) and Chappell Stand (to its right).

Of more interest to the footballers (and cricketers of course) is that the iconic Adelaide Oval wicket table has been replaced with eight drop-in wickets. Drop-in wicket technology was first introduced at the MCG and has subsequently been used at ANZ Stadium, Etihad Stadium, Simonds Stadium and even for the first time this summer at Aurora Stadium in Launceston.



The drop-in wickets at Adelaide are slightly different to those at the MCG in that the replacement turf, or that which will be in place during the AFL football season, is also housed in trays but sit on strip footings rather than a concrete base like at the MCG. The strip footings may assist with better drainage in the middle of the Adelaide Oval compared to the shallow depth of sand that sits above the concrete pad footing at the MCG.

However, it will not be an easy transition from cricket to football for curator Damian Hough as to officially open the Oval the Rolling Stones are playing a concert on the ground on 22 March, just one week before it is set to host its opening AFL match between Port Adelaide and the Adelaide Crows. While concerts being played before AFL matches are nothing new, they certainly provide their fair share of concerns for groundstaff.

While Sydney's ANZ Stadium will host three games again this year, with the first in round two, Greater Western Sydney's home ground Giants Stadium, formerly Skoda Stadium, will host matches prior to its commitments for the Royal Easter Show. With Easter being later in 2014, the

The Adelaide Oval's new eight wicket drop-in block (pictured is the strip used for the recent 2nd Ashes Test) will be replaced by trays of turf come the football season

Joondalup Oval in Perth is one of two new venues to host an NAB Challenge pre-season practice match. As well as being home to West Perth Football Club it also hosts a local American football (gridiron) competition





clay type 'warning track' constructed immediately inside the perimeter of the baseball playing surface.

While Evergreen Turf has been contracted to undertake the majority of these works, a small team will come out from the United States not only to oversee the works but also construct the pitcher's mound and maintain the surface during the four day event (each of the MLB sides will also have a warm-up match against an Australian selection prior to the main matches).

The construction of the infield will involve stripping the Legend couchgrass and sand to a depth of around 60mm before laying a double layer of geotextile fabric before placing the 'clay', which is a mixture of sand, silt and clay. The final layer on top of this clay for the infield is a 6mm layer of a calcined clay product.

Some preparatory work has already been undertaken in the redevelopment of the northern end of the ground with the playing surface becoming somewhat flatter to conform to the requirements of the skinned infield for the MLB.

In total around 2800m² of turf that will be removed in the conversion to the baseball field will need to be replaced following the event, with an additional 2000m² of turf also being grown for re-turfing other areas if required.

While in previous years it has only been the wicket table that has been the major concern for SCG groundstaff, this year will pose another set of challenges with the ground set to host its first AFL fixture between Sydney and North Melbourne just three weeks following the baseball. 🌱

Despite hosting AFL pre-season games in past years, 2014 will see Traeger Park in Alice Springs host its first premiership game between Melbourne and Port Adelaide. The venue was in superb condition recently when it hosted the English cricket team in a two-day exhibition match against an ACB XI

venue will host round one and three matches before being transformed into a Show arena. The greater challenge will come for curator Terry O'Keeffe to return the surface to AFL for their post-Show fixture on 24 May given the cooler growing conditions than he would have had to work with in past seasons.

MAJOR LEAGUE

While the Adelaide Oval is making plans to deal with a concert prior to its first AFL game, the Sydney Cricket Ground (SCG) is gearing up to host one of the more unique events in its long sporting history prior to its first 2014 AFL game in round four. On Saturday 22 and Sunday 23 March, two Major League Baseball (MLB) matches will be held between two of the game's biggest franchises, the Arizona Diamondbacks and Los Angeles Dodgers, to open the 2014 MLB season.

This will involve a huge transformation of the northern end of the SCG which will be converted into a playing surface to replicate the best of the baseball fields in the United States. It will see the transformation of the Legend couchgrass outfield into a clay skinned infield of approximately 1000 square metres as well as another five metre wide



Major League Baseball will come to Sydney in March with the SCG to be converted into a playing surface to replicate the best of the baseball fields in the US. Pictured is the San Francisco Giants home ground AT&T Park

PHOTO: CHRISTINA SPIROPOULOS

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It has been described by one golf course architecture pundit as the “most extraordinary golf course built in Australia since the Great Depression”. We’re talking Ellerston, the Greg Norman-designed golf course constructed exclusively for the Packer family which opened in 2001.

Since it’s unveiling, Ellerston has intrigued and amazed an industry. Its exclusivity and inaccessibility means it has retained a wonderful mystique, while for the privileged souls who have graced its immaculate Santa Ana couchgrass fairways and Pennlinks bentgrass greens, it has set a benchmark in terms of golf course presentation that few others can rival.

Simply put, Ellerston is a beast. Crafted specifically with the single-figure golfer in mind, this unrivalled course twists and turns, climbs and plunges its way through 212 magnificent hectares of spectacular Upper Hunter Valley countryside. Measuring 7318 yards off the back plates it is, as the same pundit above also offered, “golfing opulence”.

Unfortunately for the average golfer, getting the chance to play Ellerston is as remote as the course’s location. The heavily guarded gates only open to members of the Packer family and invited guests and as such the course registers just 550-600 rounds a year, most of it seasonal. Few golfers, no committees – on the surface it would appear to be a course



superintendent’s dream job, but with Augusta-like presentation standards demanded, the expectations couldn’t be any higher.

“Second best isn’t good enough.” Those were the frank words that came from the lips of the late great Kerry Packer to the man whom in October 2000 was entrusted with managing Australia’s most exclusive golfing establishment. That man, Rod Hinwood, was equally as forthright in his reply – “My sentiments are exactly the same.”

Nearly 14 years on and that course management philosophy still guides Rod as strongly as it did back then and together with hard-working assistant Ronnie Melville, a dedicated crew and the backing of a wholly ‘red shed’, the exacting tournament-like conditions demanded at Ellerston have been and are continuing to be achieved on a daily basis.

TOURNAMENT READY

Rod, who also doubles as Ellerston’s golf operations manager, is well aware of his privileged and unique position, but as he is quick to point out Ellerston is not without its

unique management challenges. Ellerston’s remoteness, sheer scale, dramatic changes in elevation and the extreme climatic variations between the seasons all conspire to keep Hinwood and Melville on their toes from a turf management perspective.

Then there is the weight of expectation. Tournament-like conditions are demanded day in, day out, and while the number of rounds may be extremely low, Ellerston’s cutting regimes are nonetheless still intensive. The course needs to be ready for play at the drop of a hat and as such Rod’s crew will go out every morning and prepare the course as if it were hosting a club championship or pennant final. If a group wants to play 36 holes in a day, the staff, which number anywhere from 14-20, will be out again in between rounds cutting and rolling greens, changing holes, moving tee markers and caddying for guests.

From October through to April, when the bulk of rounds are played, greens and collars are cut with Toro Greensmaster 1000 walk-behinds at 2.5mm and 10mm respectively up to seven times a week, with the greens



Ellerston assistant superintendent Ronnie Melville (left) and course superintendent Rod Hinwood

Course: Ellerston, NSW Superintendent: Rod Hinwood

Since its opening in 2001, Ellerston has relied on Toro to keep the exclusive course in tournament-like condition day in, day out. Pictured is the par three 6th



stimping an effortless 12'-13'. The Santa Ana tees are also cut with Greensmaster 1000 walk-behinds at 5mm 3-5 times a week.

Fairways are maintained with a fleet of Reelmaster 5510s and approaches cut with a Greensmaster 3250-D 3-5 times per week, both at 10mm, while the step roughs and surrounds are shaved 3-4 times a week at 44mm with two Reelmaster 3500-D Sidewinders. Ellerston's ever-increasing intermediate deep rough is kept in check daily between 75-100mm via two Groundsmaster 4000-D tri-deck mowers.

With such a challenging operating environment and level of expectation regarding course presentation, it is little surprise that a full suite of Toro equipment and irrigation componentry was specified from the course's inception. Quality and reliability were the two key factors behind this decision and during his tenure Rod has come to trust and rely on Toro's complete package,

from the dependability of its industry-leading course maintenance equipment through to its unmatched after-sales support and back-up.

PROVING GROUND

With a 70m change in elevation from top to bottom, several creek crossings, a variety of different surfaces and the sheer size of the property, Ellerston is in many ways the ultimate proving ground given the unique demands it places on golf course equipment. All year round Ellerston's fleet of five Workman MDX and two Workman HD utilities notch up some serious kilometres, while the step rough and rough mowers are rarely idle, with Ellerston recently taking delivery of a second Groundsmaster 4000-D to reduce the substantial time this task consumes.

With temperatures plummeting as low as -8°C in winter and topping out in the 40's during summer – disease pressures at Ellerston can be severe. Assisting Rod to keep the surfaces disease-free and pristine is Toro's top-of-the-line heavy duty MultiPro 5800 sprayer. With a 1,136 litre capacity, six-diaphragm pump and Pro Control XP console, the 5800 gives Hinwood unrivalled productivity, performance and versatility.

Ask Rod what his favourite piece of Toro equipment is and his affection for the Greensmaster 1000 walk-behinds is plainly obvious. Ellerston's eight units (four greens, three tees and one collar) are all original and with a couple of sets of new reels and groomers over the years they haven't missed a beat. "Fourteen years and the quality of cut



The reliability and versatility of all Toro equipment, from its cutting units, Workman utilities through to renovation equipment such as the ProCore 648, ensure the exacting standards demanded at Ellerston are always met

they produce is still as good as the day they were first delivered," says Rod. "You can't top that!"

The irrigation system has also been Toro since the course's opening. Originally a central decoder system which performed without fault in the early days of the course's life, in recent years Hinwood has upgraded to Toro's radio controlled Network VP satellite system which is managed by Toro's ever-dependable SitePro central control system.

"I can't speak highly enough of our Toro irrigation system," says Rod. "The versatility that the SitePro control system gives us on the golf course is unrivalled, especially when you consider the scale of this golf course. The VP satellites give us the flexibility and reliability needed with several levels of protection. One thing I can't afford out here is hot spots, but with the Toro system we can rely on it providing the coverage we need."

"Over the years we have gone from 800 heads to 1200 heads across the course and last



Ellerston's fleet of Reelmaster 5510s make short work of the par five 9th fairway

Toro Turf Tour **TORO**

Course: Ellerston, NSW **Superintendent:** Rod Hinwood



Recently Ellerston upgraded to Toro's radio controlled Network VP satellites run off an ever-reliable SitePro central control system

year we upgraded all our greens sprinklers to 835 Series. They are so efficient and mean we can put the water where it is needed most."

SUPERIOR BRAND

Above all, however, it is the company's reputation as having the best after sales support network in the industry that ensures Hinwood's relationship with Toro will continue to be a lasting one. Toro prides itself on this aspect of its business and given Ellerston's remote location that capability is certainly put to the test. True to Toro's word, however, Rod has never been let down.

"The expectations placed upon our maintenance operations are very exacting," explains Rod. "That's why I rely not only on Ronnie and the crew but also a reliable fleet

of machinery and efficient irrigation system to keep the place in tournament condition all year round.

"It's Toro's whole package – the quality, reliability and versatility of their equipment and the company's after sales support which is why I wouldn't choose any other brand for our maintenance requirements. After-sales service is such an important consideration for any course superintendent, but more so for us here given our remote location.

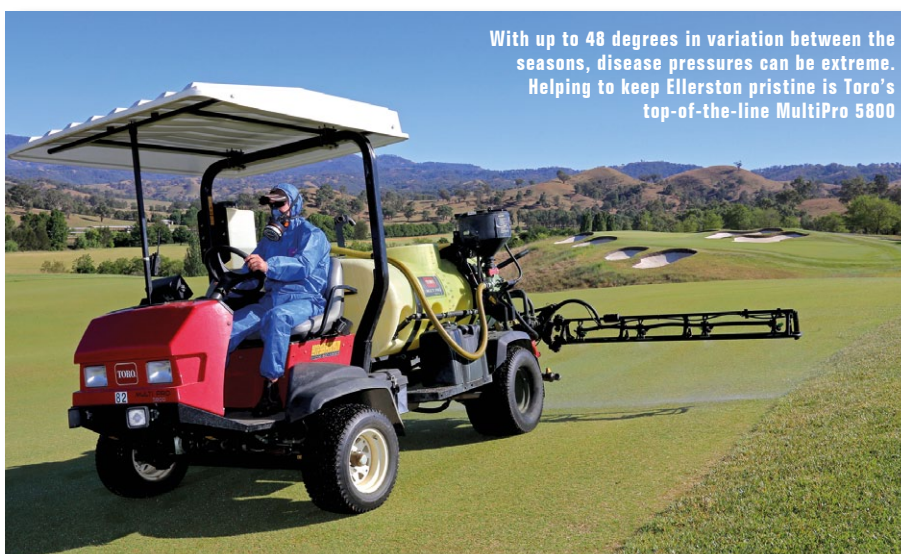
"I genuinely believe that Toro cares about all their customers and the same goes with any problems or faults that may occur with their equipment. It's that level of commitment and willingness to give the customer a working solution which makes Toro superior to others and why it is the perfect fit at Ellerston." 🙌

ELLERSTON'S RED SHED

- 8 x Greensmaster 1000s (4 greens, 3 tees, 1 collar)
- 3 x Reelmaster 5510 fairway mowers
- Greenmaster 3250-D approach mower
- 2 x Reelmaster 3500-D Sidewinder step rough mowers
- 2 x Groundsmaster 4000-D tri-deck rough mowers plus an original 4000-D used solely as a fairway scarifier
- 5 x MDX Workmans and 2 x HD Workmans
- MultiPro 5800 sprayer and 7201 Workman spayer
- HDX Workman with topdresser
- Pro-Core 648, Aerothatch/Seeder, Rac-O-Vac



Ellerston's spectacular location is rivalled only by the conditioning of its turf



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Count on it.

The aggressive spread of kikuyu on Montague Island off the NSW coast has been identified as the single greatest threat to seabird populations on the island



When turf (and columnists) turn



John Neylan
looks at what
happens when

kikuyu is left to run
rampant and dissects
the recent Inside Golf
magazine column by
former professional Larry
Canning which caused
a backlash from course
superintendents across the
country.

When I first started working as a turfgrass agronomist, kikuyu was considered to be a weed. As time has transpired, that weed has become a well-established turfgrass, often whether you want it or not. As we have seen in recent years there have been ongoing selections of kikuyu and the introduction of new cultivars which are actively marketed as a premium product. It is hard to believe that we now inspect paddocks of kikuyu for quality control purposes with concerns about purity, turf quality, density, etc.

Recently I was watching Gardening Australia on the ABC which was running a special programme on 'Landscapes and Biodiversity'. One of the stories which caught my eye was on kikuyu and how "this insidious weed" was being held responsible for the decline in seabird populations.

The location was Montague Island which is about 9km off Narooma on the NSW coast. The problem was that the spread of kikuyu has been identified as the single greatest threat to seabirds on the island (Environment and Heritage, NSW <http://www.environment.nsw.gov.au/parkmanagement/montagueislandshrp.htm>).

Kikuyu grass (*Pennisetum clandestinum*) was first introduced into Australia around 1918. Its ability to quickly adapt and naturalise to varying local environments saw it widely planted in the 1920s and 1930s as it offered farmers a durable, aggressive and nutritive grass which outgrew problem weeds in pastures (Morris, 2005).

Kikuyu was also used extensively as an erosion control measure on river banks throughout the 1950s and 1960s, followed by use on newly constructed roadside embankments. Its invasive nature and preference for fertile soils has seen kikuyu colonise many turfgrass playing surfaces, such as golf courses, sportsfields and home lawns.

On Montague Island, kikuyu was introduced as an erosion control measure following the construction of the light station complex in the late 1800s which severely disturbed the island's sandy soils. Initially erosion control was attempted by spraying the surrounds with tar, but in the 1900s light keepers introduced kikuyu grass and many other non-native plants to help stabilise the soils and provide stock feed (for dairy cows and goats), as well as for decorative purposes.

Of all the weeds on the 82 hectare island, kikuyu has been the most invasive, spreading across nearly 40 per cent of the southern section of the island. In parts, kikuyu infestation has created a monoculture which has effectively 'choked' out all other native plant species.

Montague Island is one of the most significant seabird areas on the east coast of NSW with over 30,000 shearwaters, crested terns and little penguins nesting and breeding on the island. Little penguins have been recently studied by Charles Sturt University and their studies support the fact that the presence and continued spread of kikuyu represents the single greatest threat to seabirds on the Island, for the following reasons:

- The spreading kikuyu is displacing and reducing traditional seabird breeding areas on the island;
- About three per cent of the island's entire penguin population of approximately 6000 pairs are fatally strangled or entrapped in the spreading kikuyu biomass each year;
- During the summer and dry winter months, the kikuyu growth dries out and becomes a considerable fire hazard. At these times the seabirds are at risk of wildfire due to lightening strikes or accidental fires; and
- If the kikuyu is not controlled, there is the potential for the vegetation on the southern end of the island to become a monoculture.

Large areas of previously native vegetation became dominated by kikuyu grass which, over time, increased in thickness to form a dense mat (over a metre high in some areas), subsequently reducing seabird access to breeding habitat (Department of Environment, Climate Change and Water NSW, 2008).

As a result, large areas of habitat previously used by nesting little penguins, burrowing short-tailed shearwaters, wedge-tailed shearwaters and sooty shearwaters became disused. In addition, seabirds which nested in the kikuyu grass risked becoming entangled in its thick stems.

On the island it was estimated that the kikuyu was spreading at over a hectare per year. These characteristics of kikuyu are well familiar to those of us that have tried to implement control programmes in turf areas or trying to prevent its invasion from a neighbouring property.

In 2004 a restoration programme was started by the NSW National Parks and Wildlife Service on Montague Island which involved a multifaceted approach. Initially the kikuyu was sprayed with glyphosate to kill the existing growth and to allow it to dry out. The remaining dead grass was burnt to remove the metre-deep mass of grass with further follow-up applications of herbicide applied to the regrowth.

Research has shown that removal of kikuyu by fire allows the birds ease of movement and reduced risk of injury or death from entanglement in the plant's runners. After the fire, these areas are



PHOTO: DR AMY HARRIS

About three per cent of Montague Island's entire penguin population of approximately 6000 pairs are fatally strangled or entrapped in the spreading kikuyu biomass each year

revegetated with native plant species to provide a suitable habitat structure for little penguins and other seabirds.

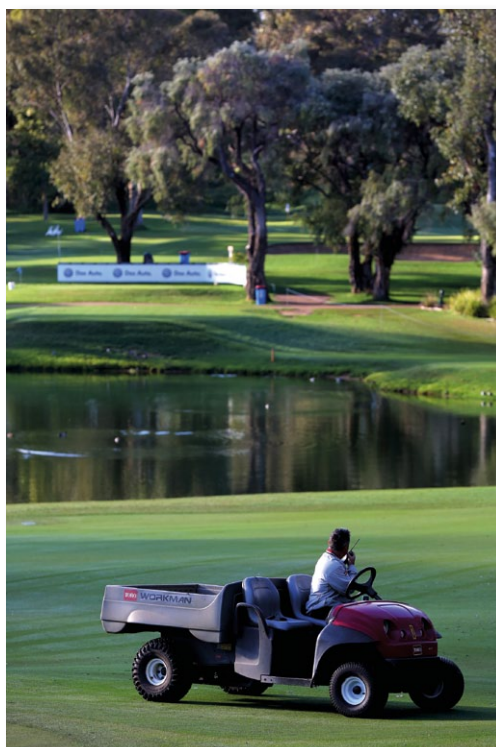
It is interesting to view an aspect of turfgrass agronomy that is so common to us but in a very different context. It reinforces our definition of a weed i.e.: a plant considered undesirable, unattractive, or troublesome, especially one growing where it is not wanted. It is all about context.

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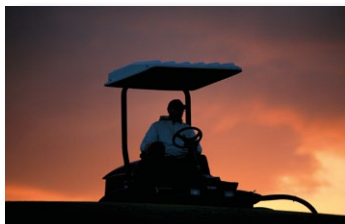
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It is the skill of the course superintendent and the staff that creates the environment for the enjoyment of the golfer and hopefully keeps them in the game



The hours of planning, preparation and sheer hard work that takes place to present a golf course is often unseen by the club golfer



last word

Why does it have to be 'Super' tough?



Larry Canning
ed @insidegolf.com.au

I WOULD like to ponder, along with you, my readers, the subject that is Course Superintendents. We used to call the lads Green Keepers but in this day of political correctness, it's now Course Superintendents. Just like a Club Pro is now The Senior Manager of Golf and Retail Operations and the Gardener is the Executive Officer of Horticulture, Bark Chips and Manure Management.

With the GFC (which until recently, I used to think stood for how expensive KFC had become), Management and Committees have had to make some pretty tough decisions to keep the game buoyant and sustainable. Gone are the days of bribing a board member into putting your grandson's name down for membership so he can become a mid-week probationary member by the time he retires. The people in charge



The game of golf is already hard enough, so why do Course Supers have to crank it up with ridiculously tough pin placements and extra-difficult setups?

course thinking he or she can one day master it if only they could just improve their slice. Sure, there are some tough holes out there but it's a

Titleist? In all my years as a professional, I've heard all kinds of complaints from golfers like, "It was so slow out there I had to play a provisional on 17 for fear my first ball could decompose" or "Old Clem Windbottom is such a burglar, it's a wonder he doesn't roll up to the first tee with a stocking pulled over his head".

But I'm yet to hear someone come into the pro-shop and say "Larry we need to make this course harder because we all played too well today".

I'm pretty sure we don't need to do a global referendum to establish that the game isn't very easy and the best way to keep the game forging ahead is not to find ways to make it harder. So why do our mates put flags on the side of cliff faces or 4 feet from the edge of a water hazard?

It's as if the term "Monthly Medal" has some strange masochistic underlying interpretation by the Course Super around the world and a Pro-Am is a licence to make scores as high as physically possible so the sponsors look like buffoons and the pros appear to be beginners.

The sad thing is I've met some really super... Supers who know more about grass than Keith Richards, and can turn an ordinary piece of dirt

superintendents are viewed. It is an image issue that we have been trying to deal with for as long as I have been in the turf industry.

Larry went on to expound how hard clubs had worked to keep the game "buoyant and sustainable". That may well be, however, the boards of management of many clubs have also considerably squeezed course maintenance budgets while asking the course superintendent to maintain the same standards with less. In the main, superintendents have complied and found a way, often at considerable personal cost. It is the skill of the course superintendent and the staff that creates the environment for the enjoyment of the golfer and hopefully keeps them in the game.

Another of Larry's over the top comments was that "Everyone seems to get it except our old mate, the course super, who obviously has some kind of vendetta to settle with everyone who has attempted to play well on his course". The response to that is that the course superintendent is the reason why people have the enjoyable experience. The hours of planning, preparation and sheer hard work that takes place is often unseen by the club golfer, let alone those individuals that are playing a one-off event such as a Pro-Am.

To imply that a superintendent makes a deliberate effort to penalise the golfer is wrong. There is no doubt that at times the course set up can be too challenging for many golfers, but can this be directed entirely at the superintendent? Does the club have a course policy and set up document that sets the standards for the course?

From my experience a difficult set up or a set up that is considered to be 'unfair' results in plenty of discussion and it is a foolish superintendent that does not respond. If all superintendents followed Larry's perceived model of operation they would not be employed for long.

◀ **Larry Canning's Inside Golf column last September hit a raw nerve with course superintendents**

TEERING OFF

In the 30 August 2013 edition of The Cut, there was a piece highlighting an article that Inside Golf columnist Larry Canning penned in the magazine's September 2013 edition. Canning's 'Last Word' column, titled 'Why does it have to be 'Super' tough?', fired a broadside at golf course superintendents in regards to course set-up and pin placements.

The article was ill-considered and based on ignorance and Larry, who to his credit did pen a later apology via The Cut, copped a deserved whack. It was somewhat representative of the commentary that you often hear regarding golf courses and their playability, particularly from the lower handicap golfers, many of whom want conditions more challenging rather than easier.

As many superintendents indicated, the article was insulting and the description of the position of course superintendent was demeaning. However, it does raise the question of how golf course

The article does raise one aspect that is common and that's the whinge factor! Let's face it, many sportspeople are whingers. Whether it is football, cricket, golf, bowls or horse racing, the easy out is to blame the playing surface or the set up. Maybe they just weren't good enough and that their skills failed to meet the challenges of the day.

The question that has to be asked is who was whinging? Was it all the players or was it the rowdy minority making the comment about the golf course? It is often the vocal minority that creates a lot of angst for not only the course superintendent but also the general manager and the board. The challenge is being able to respond in a reasonable and rational manner. This is often where a lack of club policies can make it very difficult to provide a decisive response.

A FAIR TEST?

A good point that is made in the article is about not making courses harder so as to attract or retain people in the game. I doubt that there would be many that would disagree. It is interesting that as we come off the tournament season in Australia that golfers are looking at these tournament courses and wanting the same. In particular, the demand seems to be for firmer, faster and truer surfaces.

This is not a superintendent-driven call, it is the golfer and probably more specifically the low handicapper that is pushing the agenda. This very small percentage of golfers can often drive the agenda and put it beyond the superintendent's control. The challenge for all clubs is being able to provide a course that challenges all standards without demoralising the less talented.

Larry's exaggerated comment about bad pin placements also deserves some analysis. From time to time the selection of pin placements can be less than desirable – from my observations this is often on one day and maybe one or two greens. Sometimes mistakes are made – just like a sliced shot or a duffed drive. At times the circumstances change during the day – the wind comes up or changes direction unexpectedly, or the forecast rain doesn't occur and the greens get too quick for that pin location which inadvertently creates a difficult pin placement.

With any failure or perceived failure on the golf course it does require scrutiny and discussion. What are the factors that created a less than desirable outcome and what could have been done better? Superintendents are doing this every day.

There are many interrelated factors that can affect an outcome such as a less than ideal pin placement – maybe it was a club directive, did the weather conditions change, maybe the players' skills failed them or possibly the design of the green is the problem. On many occasions the superintendent has to find a balance on a green that is poorly designed with few fair pin placements. Maybe have a crack at the golf course architect!



NEVER BETTER

Larry's article has concentrated on one particular aspect of course preparation and used this as some reason as to why people maybe leaving the game. Most involved in the golf industry would understand that golf the game and the management of golf courses is facing many challenges if they are to remain sustainable. There is a lot of competition between clubs for members and the condition of the course and the challenge it provides would be one factor that encourages a player to join one club over another.

As I have discussed in other articles and presentations, golf courses have never been better presented. It is a function of many factors including increased skills and training, superior grasses, improved construction techniques, better irrigation systems, improved maintenance equipment and, of course, increased budgets. It is very difficult to ease back from these standards without eliciting a negative response (the greens were soft and slow, there are weeds in the rough etc...).

If we accept that there is some underlying sense in the article rather than a cheap shot based on ignorance, it does challenge golf clubs to look

Golf courses have never been better presented and it is very difficult to ease back from these standards without eliciting a negative response

Groundstaff at NSW Golf Club let it be known their feelings at the 2009 Australian Open after Stuart Appleby had a crack at the course despite shooting back-to-back rounds of 66

AUSTRALIAN OPEN		
AFTER		SCORE
10		-15
10	APPLEBY	-12
11	IS A	-8
11	WHINGER	-6
14		-5

at the direction they are setting. The golf course superintendent is an employee of the club and with any employee they need to know the philosophy of the organisation, its strategic plan and the policies and procedures that provide the direction.

What this piece of writing does highlight are some interesting points for all of us to think about;

- Do not criticise a profession that you have no firsthand knowledge of;
- As an occupation we still struggle to sell ourselves, our knowledge and to get people to realise that golf course management is multi-faceted. While this rant is insulting it does provide a needle to look more closely at how we promote our profession both within the club and to the wider golfing community; and
- Two questions for the 'Larrys' of the golfing

world – I wonder what he scored on that day and whether he would like to spend a week on the tools setting up a course for a Pro-Am.

AN ODE TO THE GREENS KEEPER

In the light of the above commentary, it was rather fortuitous that the poem presented below was reprinted in a recent USGA Greens Section newsletter from the January 1923 Bulletin of the Green Section of the US Golf Association. It sums up quite beautifully the golfing mindset but acknowledges the great job that golf course superintendents do. It also demonstrates that while the technology and knowledge has changed, the politics of turf management still seem the same. Thank you Mr Guest. Martyn Black eat your heart out! 🌱



THE GREENS KEEPER BY EDGAR A. GUEST

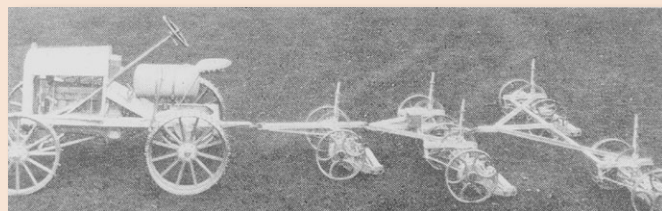
As appeared in the January 1923 Bulletin of the Green Section of the US Golf Association

*He's on the job at break of day and when the stars come out,
There's always trouble on the course for him to fret about,
He starts the gang to work at dawn and follows them around
Then listens to committeemen whose wisdom is profound,
They talk of "bents" and "fescues" in a way that makes him squirm
For they acquire much knowledge in one brief official term.
His task is one that calls for tact, for lacking that it means
Next year there'll be another man brought on to keep the greens.*

*The members seldom know his name, or have a smile for him,
They only wonder why it is the course is not in trim.
They only rave and rage and rant while hunting for a ball
And wonder why the greensman hasn't cut the rough this fall,
And when they find a cuppy lie or footprints in a trap
"The course is in a rotten shape!" declares each gloomy chap.
And yet my hat is off to him, now winter intervenes,
I want to pay my tribute to the man who keeps the greens.*

*He's on the job from dawn to dusk, a million pests to fight,
Tis his to see that every green is watered well at night.
The weeds attack his finest work, the drought destroys his grass,
The rain beats down the tender shoots, but still the players pass
And still they play the game they love, a happy golfing clan
Who never stop to count the odds against a single man.
And so I wave my hand to him, who toils in sturdy jeans
The best old friend all golfers have – the man who keeps the greens.*

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The University of Sydney turf research plots at the Plant Breeding Institute were established in 2006



Open for business

With the recent closure of Redlands, the University of Sydney's research plots are the only independent research facility in the eastern states. Dr Jim Hull provides an overview of the facility and its desire to remain an important asset for the industry into the future.

The University of Sydney played host to the Graduate Program in Turf Management for over 20 years, but with the recent retirement of Professor Peter Martin this has regrettably come to an end. However, the involvement of the University of Sydney in turf research has not ceased and hopefully will continue long into the future.

The university's Plant Breeding Institute is located on the Camden Campus in Cobbity, NSW and is a part of the Faculty of Agriculture which has extensive farm sites around the area, one of which hosts the turf research plot complex. This set of research plots include all of the major warm-season and cool-season turfgrass varieties and can be expanded on demand to include niche species and varieties.

The site was established in 2006 with turf donated by many Sydney-based turf producers. The warm-season plots include multiple varieties of couch, buffalo, kikuyu and seashore paspalum as well as plots of zoysia and Queensland blue couch. The cool-season plots include perennial ryegrass, tall fescue, Chewings fescue, hard fescue and creeping red fescue, creeping bent, *tenuis* bent and velvet bent.

While not seeking to replicate the 'living library' concept that was formerly done so well by the Redlands group in Queensland, the University of Sydney turf research site has sought to have the mainstream grasses available to industry for product development, stress research and other, yet to be determined, research. The presence of multiple varieties of each genus is extremely useful for phytotoxicity and tolerance testing, as some species and varieties have shown profound differences in tolerances to herbicides.

Over the last decade the site has been well utilised by large commercial companies such as Bayer, Syngenta and Scotts and by smaller groups including Westgate Research and Independent Turfgrass Consulting. Having such a facility available is critical according to Bayer's turf consulting manager Jyri Kaapro and recently appointed Amgrow product development manager and former University of Sydney graduate Dr Brett Morris.

"The turf research facility at the Camden Campus of the University of Sydney has been invaluable in our product development over the last seven years and we believe will continue to be in the future," says Kaapro. Adds Dr Morris: "The plots are one of a kind with the range of turf varieties in which we conduct testing of new products on. They differ from other sites because they are replicated in the ground, are on a larger scale and are refreshed regularly, meaning product research is being undertaken on turf varieties which are current in the marketplace."

Discussions have also taken place with the Irrigation Association Limited and local TAFEs regarding product support and research topics for urban, peri-urban and rural horticultural issues.

RECENT RENOVATIONS

The turf plots have undergone a renovation programme this past spring to refresh the cool-season plots and to purify the warm-season varieties.



Jyri Kaapro from Bayer presents his latest research findings at a recent field day. The University of Sydney facility has been invaluable in Bayer's product development over the last seven years

Seed for the cool-season plots was generously provided by PGG Wrightson Seeds. The irrigation system on the plot area has also been upgraded thanks to a generous donation from Rain Bird.

The bentgrass area has been largely sprayed out, with Sustainable Turf kindly providing a field topmaker to strip and remove the thatch. Large areas of Mackenzie, Penncross and SR1020 bents have been resown to provide a range of textures and susceptibilities to stresses and diseases.

An old area of bent that includes strips of velvet and *tenuis* bents has been retained as these have been very interesting in the past and continued monitoring is desirable. The SR7200 velvet bent has defied expectations that it would not like the very hot summers at Cobbitty and it has thrived under minimal maintenance for the last seven years. The Manor *tenuis* bent has also maintained very good turf quality under some trying conditions over that time and provides an interesting contrast to the creeping bents.

Besides the work with industry partners, the University of Sydney also continues to produce valuable research through top turf scientists. Dr Peter Martin, now an Honorary Research Associate of the university, has been teaching a Masters course on turf management for over a decade as well as conducting significant turf research through supervising PhD and Masters students. He is currently focused on kikuyu research.

Senior Research Fellow Dr Percy Wong continues to conduct ground-breaking research into new turf diseases, especially on couch and has described several new fungal pathogens such as *Gaeumannomyces wongoonoo* (the cause of Wongoonoo patch of buffalo), *Magnaporthe garrettii* (the cause of a patch disease of couch) and *Magnaporthe griffinii* (the cause of summer decline in hybrid couch). He has also carried out research on identifying sources of resistance to kikuyu yellows through a Horticulture Australia Limited grant.

With the regrettable closure of Redlands, the University of Sydney research plots are the only independent research facility in the eastern states. The management of the Plant Breeding Institute is committed to maintaining a facility that can conduct testing in secluded areas (away from prying eyes) and testing that might result in the destruction of the turf (usually not popular with host superintendents who see big patches on their practice putters).

"The turf industry is an important one for the Sydney basin and the University of Sydney is



continuing its commitment to the industry with increased research support from the Faculty of Agriculture and Environment with our research centres based out at Camden," says James Bell, operations manager for the Faculty of Agriculture and Environment.

"The plant breeding and disease research that is being conducted out of the Plant Breeding Institute and the newly opened Centre for Carbon, Water and Food is increasing our knowledge of the plant physiology of turfgrass and how it interacts with the environment. The support of the turf industries and those who use it is required to keep this type of research maintained and increased for the public good of the community and changing environment we live in."

For more information about the University of Sydney's turf research facilities contact Dr Jim Hull james.hull@sydney.edu.au or visit http://sydney.edu.au/agriculture/plant_breeding_institute/cobbitty/index.shtml 📄

The turf plots have undergone a renovation programme this past spring to refresh the cool-season plots and to purify the warm-season varieties. Pictured are the warm-season phytotoxicity plots

Turf equipment field day at Cobbitty



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Perhaps the greatest revelation of the EcoTurf project was the role of rhizomes. By coring out the grasses at the beginning and end of the drought period, researchers we were able to establish a strong relationship between drought resistance and rhizome production. Pictured is a rhizomatous EcoTurf (left) compared to the commercial cultivar Wintergreen (right)



Resisting drought

In Volume 15.6 Dr Chris Lambrides provided an overview of the extensive four year EcoTurf project which aimed to develop a new generation of drought-resistant bermudagrasses for soil stabilisation, public parks, sports-fields and saline landscapes. In this follow-up article he joins with project team members Dr Yi Zhou and Prof Shu Fukai to look at what their research project has gleaned regarding the drought resistance capabilities of turfgrasses.

In the last edition of Australian Turfgrass Management (*'Ecoturfs'*, *ATM Vol 15.6 p46-49*) we provided an overview of the four-year (2007-2011) EcoTurf project funded by the Australian Research Council. The primary aim of the project was to develop drought-resistant grasses from a large collection of over 1000 ecotypes and it successfully produced a range of bermudagrasses (green couch) that have now reached pre-commercial status. This article focuses on some of the lessons we learned from four years of drought research.

STUDYING DROUGHT CAN BE PROBLEMATIC

Studies of drought resistance with a large collection of turfgrasses can be quite problematic for a number of reasons, so at the beginning of the project many questions were raised. Should experiments be conducted in the field or glasshouse? How can rainfall be excluded during a field experiment? What criteria of drought resistance should be adopted? Which soil type, fertility levels and agronomic practices should be used? What methods that don't require large inputs of human and physical resources should be employed to differentiate between a large number of ecotypes?

DROUGHT STUDIES IN SHALLOW SOIL PROFILES

You have to start somewhere so our very first experiments were pot experiments conducted in

the glasshouse or open compound that tested the drought resistance of grasses in shallow soil profiles. Portable rainout shelters were used to exclude rainfall from experiments conducted in an open compound. This research was particularly relevant to many urban landscapes where turfgrasses can be planted in shallow soil profiles.

Right from the outset we decided that all experiments should be grown under optimum nutrition. The criterion of drought resistance was 'survival period' i.e.: the time taken for a well-watered grass to reach 100 per cent leaf firing (zero green cover) after the water is turned off. The pots were made from cut down pieces of PVC water pipe 28cm-40cm deep and 10cm-20cm diameter.

The effect of different soil types (clay v sand) and cutting height (25-50mm) were also tested but neither were important factors as the ranking of the grasses for drought resistance didn't change.

The clay content of the soil determined the water holding capacity of the medium and therefore the duration of the experiment, with the grasses surviving longer in the clay soils. Because it was easier to recover roots from the sandy soil and the survival periods were shorter, we chose this sandy medium for future pot experiments.

At the end of the drought period the grasses were divided into above and below ground biomass to determine the role of the root system. These studies showed that there was large variation between the bermudagrass ecotypes for drought resistance. The resistant grasses were those that were able to react to the drying soil profile early by closing their stomata.

Stomata are small pores on leaves that allow for gaseous exchange of CO₂ and water vapour. If they close early in the drought cycle the grasses have the ability to conserve water, therefore, early stomatal closure led to lower water use that resulted in more water available later in the dry down period enabling



EcoTurf project team member Dr Yi Zhou, who completed his PhD during the four year project, standing in the turf plots at the University of Queensland's Gatton rainout shelter

the drought resistant grasses to survive longer. Interestingly, the resistance to drought had nothing to do with the size of the root system.

DROUGHT STUDIES IN DEEP SOIL PROFILES

While this pot methodology of screening for drought resistance was successful in testing hundreds of ecotypes, it had some obvious shortfalls. The timing of the drought period in pots was critical because the grasses could easily become pot-bound. Growing grasses in narrow pots artificially reduces the boundary layer over each grass canopy causing a larger gradient of vapour pressure between the leaf surface and the surrounding air, a process that is not observed in larger field plots.

For these reasons our research moved to the field where we grew grasses under automatic rainout shelters (see photo above) at the University of Queensland's Gatton Campus, a permanent igloo at Redlands Research Station in Cleveland and in a sandy soil in an open field during the summer in Perth (University of Western Australia's Shenton Park facility) where no rainfall was expected.

For these field experiments we used the same strategy as the pot trials where the water was cut off after the grasses were established under well watered conditions and the soil was brought to field capacity at the start of the experiment. We also used neutron moisture meters (NMM) to monitor soil water content during the dry down which was a direct measure of water use by the grasses.

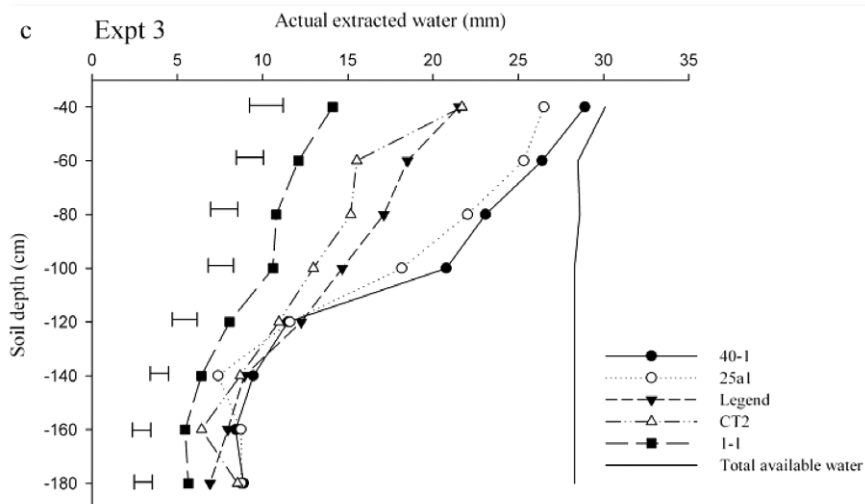
The access tubes for the NMM were placed in the centre of each plot of grass and ran for about 2m below the soil surface. For each grass we were able to measure the amount of soil water extracted every 10cm of the soil profile. In contrast to the pot experiments, the criterion of drought resistance was the change in green cover during the drought period because rarely did grasses reach a condition of 100 per cent leaf firing in the deep soils used at Gatton and Cleveland.

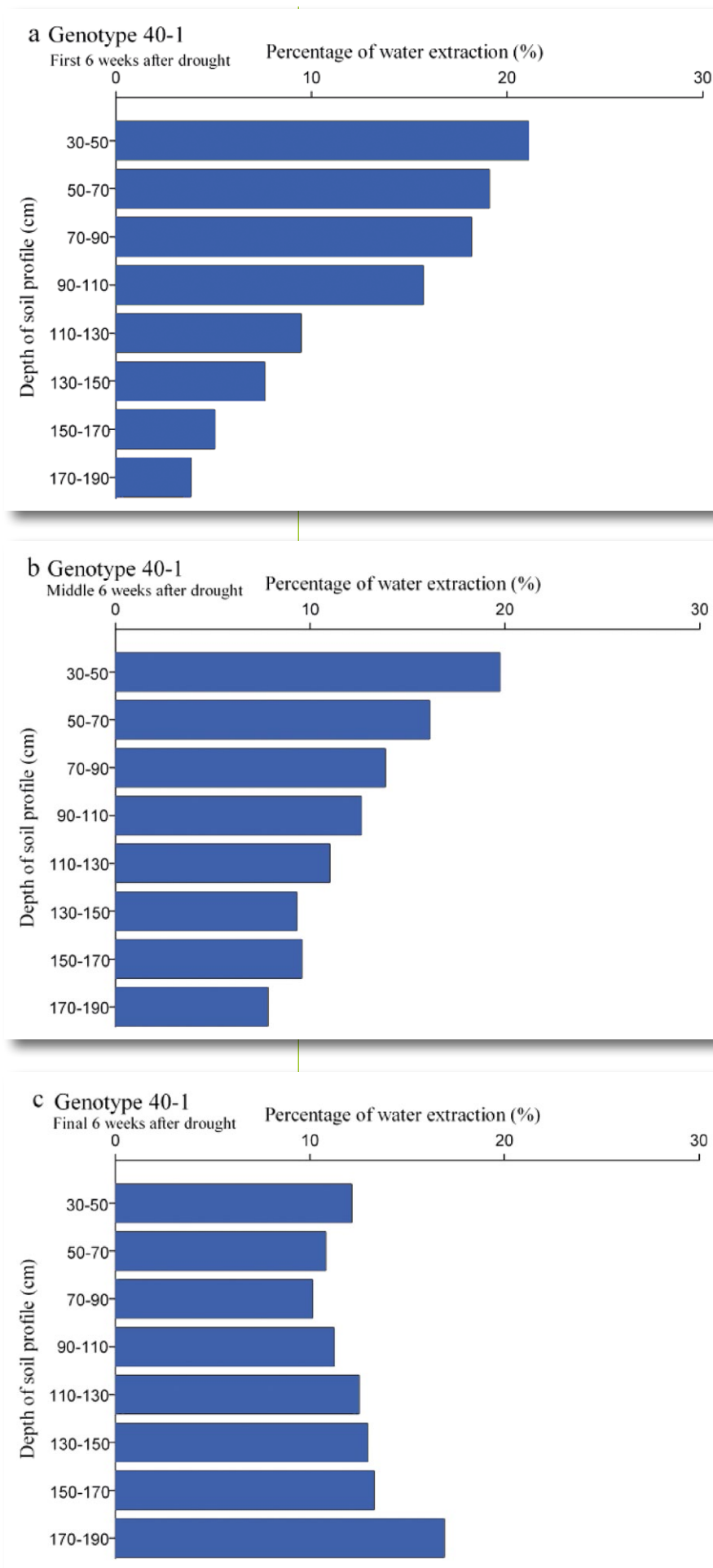
The field trials did present some very interesting and surprising results. Figure 1 (below) shows the change in soil water extraction for five bermudagrasses grown at Redlands Research Station during a drought period. Ecotype 40-1 and 25a1 were the most drought resistant, ecotype 1-1 was the least drought resistant and the other grasses were intermediate in response.

The figure demonstrates that the drought-resistant grasses were able to extract more water from the soil profile and the susceptible grasses extracted the least. Intuitively we thought that the drought-resistant grasses would have used less water, but this was not the case and this result was repeated over many experiments. What was also clear is that all grasses leave more water behind than they take.

We were also surprised by the depth of soil water extraction. To our knowledge there had been no reports of extraction at 2m deep in the profile. What was more surprising was that even the drought susceptible grasses had a similar pattern of soil water extraction so that rooting depth didn't appear to be a factor associated with drought resistance, a result that was similar to the pot trials.

Actual extracted water (EW_a) at the end of the experiment at each measured depth of soil profile of five bermudagrass genotypes under continuous drought at Redlands Research Station from 2008 to 2011. Total available water defined as soil water content at field capacity minus wilting point is also shown





To emphasise this point, at the completion of one trial at Gatton we cored down over 4m and found live roots in both the drought resistant and drought susceptible grasses. On average in our experiments the bermudagrasses grew roots down the soil profile at the rate of about 1cm per day.

Figure 2 (left) shows the pattern of soil water extraction for the drought resistant ecotype 40-1 during the early, middle and late phase of the drought. Not surprisingly, the figure shows that grasses extract water from the upper layers of the soil profile early and as the drought proceeds the majority of water is extracted from lower layers of the soil profile. Interestingly, the drought susceptible grasses show the same pattern of temporal soil water extraction although they clearly extract less moisture at each layer.

Our experiments also highlighted the low rates of evapotranspiration (ET) that turfgrasses exhibit during a drought period. Some of the best drought resistant grasses survived more than 250 days without rewatering and averaged ET rates of less than 2mm per day. This feature of turfgrasses should be highlighted in the turf industry and promoted for urban landscapes.

In one experiment at Redlands we droughted the grasses and then recovered them to 100 per cent canopy cover with full irrigation and then cut off the water a second time. The ranking for drought resistance remained unchanged as did the temporal and spatial patterns of soil water extraction. These results suggest that the roots may be inactive for certain periods during drought but are able to regenerate and maintain normal function when moisture conditions become more favourable.

However, perhaps the greatest revelation of our research was the role of rhizomes (underground stolons). By coring out the grasses at the beginning and end of the drought period we were able to establish a strong relationship between drought resistance and rhizome production.

We have now hypothesised that the role of the rhizomes is to maintain the integrity of the root system during the drought period and this role has now become the topic of future research. We have learnt a lot about drought resistance of turfgrasses but there are many more issues to investigate.

FURTHER INFORMATION


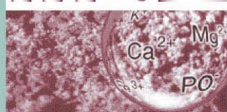
For more information about the EcoTurf project, Dr Christopher Lambrides can be contacted on 0408 247 721, (07) 3365 1103 (office) or email chris.lambrides@uq.edu.au 

Figure 2. Percentage of extracted water at each depth to the whole soil profile (30cm-190 cm) during the first six weeks (top chart), middle six weeks (middle chart) and final six weeks (bottom chart) after water was withheld for genotype 40-1. The experiment was conducted in the drought condition at Redlands from 2008 to 2011

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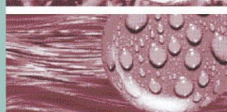
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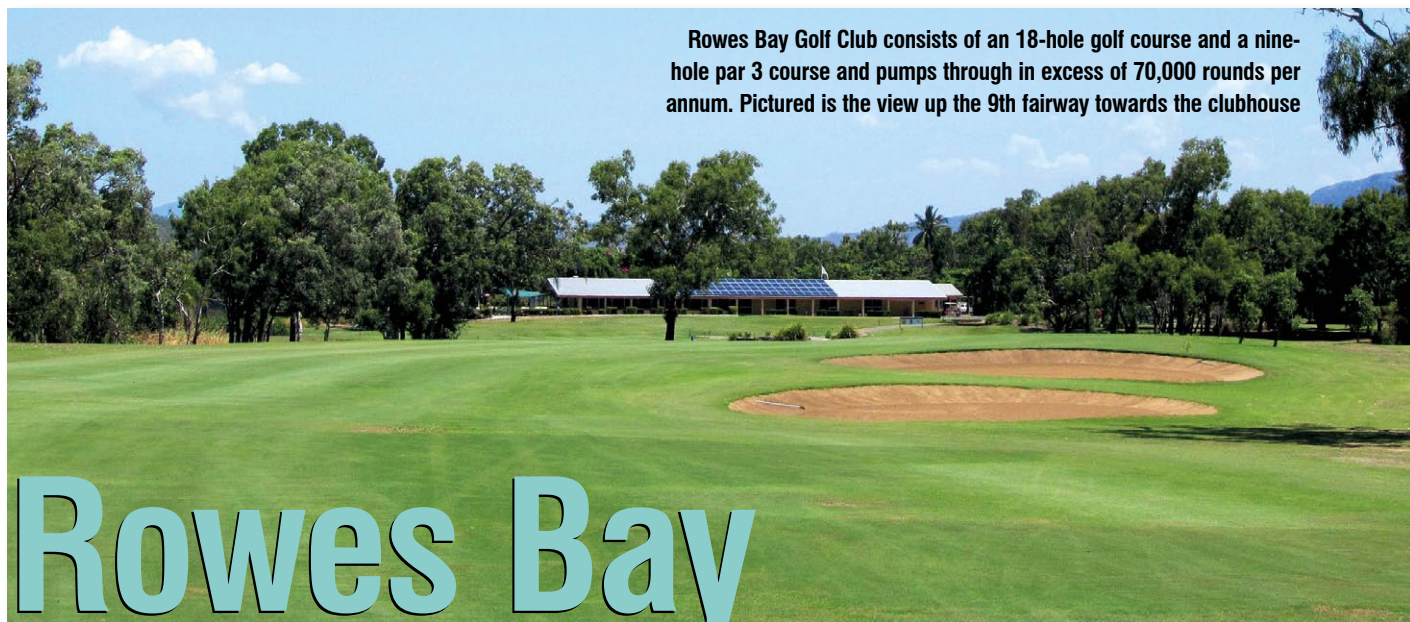
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Rowses Bay Golf Club consists of an 18-hole golf course and a nine-hole par 3 course and pumps through in excess of 70,000 rounds per annum. Pictured is the view up the 9th fairway towards the clubhouse

Rowses Bay Golf Club, QLD

Since 2007 Rowses Bay Golf Club on the northern outskirts of Townsville has been home to course superintendent Jason Bushell. Here the AGCSA member provides ATM with an insight into the course and his management operations.

Rowses Bay has just embarked on a course improvement programme which will see the reconstruction and resurfacing of some greens, such as the 5th pictured here, and new bunkering

Superintendent: Jason Bushell.

Nickname: Bushy.

Age: 36.

Family: Wife Julie, son Max.

Years as a superintendent: Nine.

Association involvement: AGCSA (seven years), GCSAQ and GCSAA.

Turf management career: Horton Park Golf Club (apprentice greenkeeper); Fieldstone Golf Club and Ohio State University (12 month Ohio intern); Horton Park Golf Club (greenkeeper); Emerald Golf Club (superintendent); Rowses Bay Golf Club (superintendent 2007-present).

Qualifications: Cert III Horticulture.

Where in Australia is Rowses Bay GC? Rowses Bay Golf Club is situated along the ocean front just north of the regional city of Townsville, Queensland. Townsville is probably best known for its large

Australian Army and Air Force bases and being home to the North Queensland Cowboys NRL team.

Give us a bit about your background in turf management. How did you start out in the industry, why did you choose a career in turf management and how did you end up at Rowses Bay GC? I began my career at Horton Park Golf Club on the Sunshine Coast. I was a junior member there and when I finished school I was offered an apprenticeship in 1998. I had previously done work experience on school holidays for about 12 months prior and when a staff member left I was offered an apprenticeship.

Following my apprenticeship I took part in The Ohio Program doing nine months at Fieldstone Golf Club in Delaware and three months at the university. I returned to Horton Park as a greenkeeper for another four years before moving to Emerald as superintendent for two years in 2004. I moved to Townsville in late 2006 for a position as a landscape supervisor but was offered the position as superintendent at Rowses Bay in early 2007.



The Rowes Bay maintenance crew (from left) Justin Abdul, Michael Sollitt, Jason Bushell (superintendent), Brendan Lowe (assistant superintendent), Sam Tully and Dean Zahner

Give us an overview of Rowes Bay GC and some of its unique characteristics? Rowes Bay consists of an 18-hole golf course and a nine-hole par 3 course. It is a very flat course with only a few bunkers, but quite a bit of rough and hazard area. The front nine is quite tight but the back nine is fairly open. We have just started a course improvement programme where we are resurfacing/rebuilding some greens and adding bunkers. There is quite a bit of wildlife with most of the dams having barramundi in them (a 93cm one was caught just recently).

What are some of the unique features about Rowes Bay GC from a turf management perspective? Is it an easy/hard facility to manage? It can be quite challenging for a number of reasons. The weather can be quite extreme with high disease pressure in summer. There are several different profiles for greens so this can make it a little difficult with different management techniques needed for some greens. Also the fact we are just above sea level and very flat, it doesn't take a lot for the course to be flooded.

Take us through your turf management operations at Rowes Bay and how you have fine-tuned them during your time as superintendent. We cut greens most days with the odd break on some Mondays. Greens are rolled between 2-4 times a week and in winter this allows us to skip some cutting. Tees are cut weekly with Primo applied monthly almost all year round. Fairways are cut every week unless it is too wet. We use Primo as needed probably every 4-5 weeks for about nine months of the year.

The biggest changes implemented would be to the fairways. They have been shaped now with a step cut so they are easily identified. They have Primo applied regularly. We spend a lot of time eradicating weeds, particularly crow's foot, and we have just begun using pre-emergent on them.

I have also introduced an approach cut which is done twice a week. The surrounds are cut weekly almost all year round with a cylinder mower. When I first started surrounds were just cut with deck mowers, there was no approach cut, greens were only rolled on special occasions and there was no definition of the fairways.

Any special environmental considerations that you have to incorporate into the management of the course? There is quite a bit of wildlife on the golf course so we do our best not to disturb the native animals too much. We are also surrounded by a national park so we have to be careful we don't cause any disruption to this area.



What are some of the major challenges facing Rowes Bay GC both from a turf management and general club management perspective? The challenges are probably similar to most clubs with not enough funds to cover costs. We are a very high traffic course and also very affordable compared to some courses. Due to the warm climate, if buggies aren't allowed on the course then the golfers just don't come, so if we have a bad wet season the revenue takes a big hit.

From a turf management perspective a fair area of the course is only just above sea level so the ground is very salty and the back nine in particular can be difficult to maintain due to excess salt. After heavy rain or any sort of excess water, a white film of salt can be seen on the surface in certain areas.

Outline any major course improvement works recently completed and/or highlight any ongoing or future works that the club is undertaking. The club has just put a strategic plan in place which is going to include a long-term course improvement plan. This is going to try and eventually flood proof the course which in the long-term will increase revenue.

The first part of the project will be two greens, some fairway bunkers and tee rebuilds. The greens we are working on at the moment are actually going to be a California style construction. They have Megaflow drainage pipe with the sock left on and



Lowe displays his recent 'catch of the day' from the course dam

Rowes Bay Golf Club's closing hole is a 135m par three





Rowes Bay receives on average about 1200mm a year, however, 2013 has been the driest in the seven years Jason Bushell has been superintendent. Pictured is the par three 4th

With the course right on the coast and very flat, it doesn't take much for the course to flood. Excess salts can also prove a management challenge, as do some of the local inhabitants

about 300mm of sand over the top. This will be different to other construction that has been done here but I did do a trial on our par 3 course and it has seemed to work quite well. All the construction is done in house to keep costs down. The sand used is sourced off our site and has been tested by the AGCSA previously.

You have had to deal with some extreme weather events that have impacted the course in recent years. Outline what you have had to deal with and how the course has bounced back. We had Cyclone Yasi a couple of years ago and we got quite beaten up by it. We lost quite a few bigger trees which changed the outlook of many holes. The first five years I was here we got badly flooded multiple times each year throughout summer. This has caused one fairway in particular to not have full grass coverage for the whole time I have been here due to the salt content. We have planted some patches of seashore paspalum on this fairway and it

has now really started to take off. We will hopefully have full coverage very shortly although the wet season is just around the corner!

Water is obviously a critical issue for any golf course. How is Rowes Bay faring in the water management stakes? We are very lucky at the moment – I can have almost as much water as I want as the treatment plant has nowhere else for it to go. We are in the process of renewing our water agreement and it should remain free for now, but eventually we will have to pay for it.

The one product I couldn't manage my course without is... Primo, as we would need extra staff for mowing without it.

What are some pros and cons of being a regional-based superintendent? It is almost impossible to get to state association days that are on due to costs and the amount of time that would be needed to be away from the course to attend. The cost of freight also has to be taken into consideration whenever ordering plus the amount of time it may take for orders to arrive.

Are expectations of course presentation and conditioning any less than that placed on your metropolitan counterparts? I don't think so, most golfers want to play on the best course. Members also compare our course to other clubs when they go away even when they are playing courses that cost up to four times as much to play.

Do you have to be more resourceful as a regional superintendent? Townsville is quite big so although we are regional most things we need are available. The main thing I have learnt is to have essential spares on hand and don't leave ordering to the last



minute as transport can take longer than expected at times, especially in the wet season when roads sometimes get cut off.

If you could change one thing about your job as a regional superintendent what would it be and why? More time in the day and more staff. We are quite a busy club and most mornings are pretty hectic to beat the golfers.

How important are the relationships you have with other course superintendents/trade reps? Very important. I talk regularly with the other guys around town and a few guys down south. I have a pretty good relationship with quite a few trade reps from around the state/country that keep me informed on things.

What are some of the more unusual requests/things you have had to do as a superintendent of a regional course (not necessarily turf management related)? Probably the removal of some type of animal, whether snakes, dingoes, pigs. Pigs can cause some pretty serious damage.

What have you got in your shed? Almost all Toro these days:

- 2 x Greensmaster 3400 Triflex (greens)
- 2 x Greensmaster 3250D (tees)
- 2 x Groundsmaster 3280D (rough)
- 3 x Reelmaster 5610 (fairways and surrounds)
- Multipro 1250
- Toro Pro Core and 2500 topdresser
- Tru Turf roller
- John Deere 3250 and 955 tractors
- John Deere 1250 Bunker Rake
- Case skid steer (very old)



The next major item I would like to purchase would probably be an excavator. It would make our construction works a lot easier.

Do you think regional superintendents have a better work-life balance than their metro counterparts? Not really, I guess it probably depends on the size of course and staff numbers. We could always do with more staff.

Favourite spot on your course? The 8th or 9th tee.

Most pleasing/rewarding moment during your time at Rowes Bay? Receiving good comments about the course from golfers from bigger clubs down south is always good. I am also pleased we have managed to put a good machinery replacement programme in place as being as busy as we are and with the rate the grass grows we cannot afford to be down equipment for very long. 🌱

Rowes Bay Golf Club was hit hard when Cyclone Yasi slammed into the east coast of Australia in 2011. A number of large trees were lost which has changed the outlook of many holes

AT A GLANCE – ROWES BAY GOLF CLUB

Course specs: 83 hectare total area, 18 holes plus nine-hole par 3 course. 18-hole course measures 6155m long. Just over 1ha of greens (mainly Tifdwarf, a couple of 328), 13ha of fairways (a mixture of different varieties of couch) and 8000m² of tees (mix of different couches)

Members: 900.

Annual rounds: About 70,000.

Major tournaments: Rowes Bay Open.

Annual course management budget: \$565,000 (includes wages). We have been given an extra \$30,000 for course improvement works this year.

Staff structure: Jason Bushell (superintendent), Brendan Lowe (assistant superintendent), Ben Smith (greenkeeper), Dean Zahner (greenkeeper), Justin Abdul (greenkeeper), Sam Tully (mechanic/apprentice greenkeeper) and Michael Sollitt (groundsman).



Climate/annual rainfall: I would class the climate as dry from April to October where there is very little rain. From November to March I would class it as tropical; this is when almost all our rain falls with an average of about 1200mm. 2013 has been the driest in my time at Rowes Bay with only 700mm to December. All other years, except 2012, have hit 2000mm since I began in 2007.

Soil types: Half of the course is coastal sand dune, other half clay/loam salt pan.

Water sources: Recycled effluent from the local treatment plant.

Irrigation system: Rain Bird Stratus II with Eagle 700 sprinklers. The system is hydraulic controlled to valves on the course – something which has to be seen!

Cutting heights:

- Greens 3.5mm to 4.5mm;
- Tees and collars/approaches 9mm;
- Fairways 13mm;
- Surrounds 35mm;
- Rough 60mm.

Renovations: October and March major renos – scarifying, hollow coring and topdressing. Mini tines monthly if possible.

Major disease pressures: ERI during and just after wet, normally January / February; usually a problem on the older greens that hold excess moisture. We combat it by reducing as much thatch as possible and we do use some biological type products. We also have a fungicide programme in place from about November to March.

VALE DR DAVID ALDOUS (1946-2013)



Associate Professor David Aldous, who died last November, has been remembered as one of Australia's most prolific turfgrass educators, researchers and supporters

Australia bid farewell to one of its most prolific and dedicated turf industry educators, researchers and authors last November with the sudden death of Dr David Aldous. Dr Aldous collapsed at his Queensland home just a few hours after returning home from a trip to Canada with his wife Kaye. Despite being rushed to hospital, he passed away peacefully on Friday 1 November with his family at his side. He was 67.

Over a 40 year career Dr Aldous left an indelible mark on many industries, in particular sports turf management, and in the weeks following his death he was remembered as someone who contributed significantly to developing the knowledge base of the industry and its practitioners.

Former AGCSTA general manager and founder of AGCSTAtech John Neylan was part of the Australian contingent at the International Turfgrass Research Conference in Beijing China which Dr Aldous was involved with back in July 2013 and the news of his passing soon after the event left him and his research colleagues in a state of shock.

"It was with great sadness that we heard of David's passing," says Neylan. "My lasting memory of David will be that he seemed to be involved in so many events, whether it was presenting a paper, organising a seminar or conference, chairing a meeting or writing a book or article.

"David was a great educator and would willingly tackle any turf related topic. He had an appetite for researching the literature and becoming expert in many different areas. He regularly organised seminars with visiting overseas scientists that he managed to entice to Australia on sabbaticals and they were always well attended. David was a prolific writer whether it was a research paper, industry magazine article, conference proceedings or one of several books that he produced.

"David was a genuinely good guy and always seemed unfussed and I never heard him say a bad word about anyone. Even when we were in China

and stuck in massive traffic jams eating cold Big Macs he was unfazed and with a smile on his face. David will be sadly missed by his family, friends and colleagues."

DISTINGUISHED CAREER

Dr Aldous's career in the turf industry began following graduation from the University of Sydney in 1971. His first appointment was at the Queensland Agricultural College (now the University of Queensland-Gatton Campus) in 1972 where he started the first elective in turf management as part of the then Bachelor of Applied Science (Horticulture) programme. In the same year he started Queensland's first turf and greenkeeping course which initially ran at Ithaca Technical College and wrote the state's first turf correspondence course.

In 1975 Dr Aldous elected to start postgraduate studies, initially at Cornell University in New York State, and he completed his MS and PhD studies at Cornell University and Michigan State University respectively. He was one of the few postgraduates in Australia to undertake both higher degrees in turfgrass physiology and ecology.

In 1978 Dr Aldous was appointed senior lecturer in amenity horticulture at Massey University in New Zealand and worked with the NZ Sports Turf Institute in introducing sports turf management into the university sector as well as undertaking early research in this area.

In 1981 Dr Aldous was appointed to the then principal lecturer position in environmental horticulture at the University of Melbourne's-Burnley Campus. Early in this appointment Dr Aldous progressed the Certificate in Turf and Greenkeeping, working closely with the industry. An Associate Diploma in Applied Science (Turf) and a Graduate Diploma in Applied Science (Turfgrass Science and Management) followed which complemented the turf management elective subjects in the then Bachelor of Applied Science (Horticulture) programme established at Burnley.

In the research arena, Dr Aldous initiated a visiting scientist scheme in 2002 which saw a number of senior US turfgrass experts visit Australia. Among them were Associate Professor David Huff (Penn State University), Brian Holl (University of British Columbia, Canada), Associate Professor Sowmya Mitra (California Polytechnic), Kenneth B. Marcum (Arizona State University) and Professor John Haydu (University of Florida).

Dr Aldous was also chief investigator on a number of key projects, the investors of which included the Australian Football League, Australian Football League Players Association and Horticulture Australia Ltd. as well as a number of university grants. In recent years he generated in excess of \$100,000 in research funding to service a number of turf-related projects.

“He was a dedicated and tireless contributor over many years and leaves an immeasurable legacy to the industry which can never be repaid.”

Mark Bond, PLA

Dr Aldous authored, co-authored and delivered a number of refereed papers at national and international conferences and congresses and also helped to compile the 'International Turf Management Handbook' (1999) and 'Sports Turf and Amenity Grasses – A manual for use and identification' (2002).

Rising to Associate Professor at the University of Melbourne's School of Land & Environment, Dr Aldous semi-retired in 2007 to Queensland where he became an Adjunct Associate Professor at the University of Queensland. Despite scaling back his involvement, Dr Aldous still remained heavily involved in a range of projects and was one of the convenors of the 29th International Horticultural Congress to be held in Brisbane this August.

MANY STRINGS TO THE BOW

Outside of the turf industry, Aldous was equally as active in the parks and recreation industry. His overall contributions were acknowledged in 2005 with Park and Leisure Australia's (PLA) highest accolade, the Frank Stewart Award, in recognition of significant innovation and best practice in the parks and leisure industry.

His enthusiasm and foresight included being instrumental in establishing the much acclaimed National School in Park Management at the University of Melbourne and in 2006, on behalf of PLA and along with Garry Henshall, Dr Aldous

helped develop and subsequently deliver annual Certificated Park Management training to the Singapore National Parks Board's Centre for Urban Greenery & Ecology.

Also very active with the International Federation of Park and Recreation Administration, Dr Aldous was an Australian Commissioner, becoming its Asia-Pacific chair and subsequently world president (1998-2001) and was a member of its Science Task Force. He received its Australian Award for 'leadership in the field of parks and recreation' in 1995 and just days before his unexpected death was the recipient of its coveted Silver Medal.

"Fondly admired and loved by his peers, David will be sorely missed by them and the whole parks and recreation industry will be saddened by his departure," says PLA chief executive Mark Bond. "He was a dedicated and tireless contributor over many years and leaves an immeasurable legacy to the industry which can never be repaid." 🙏



Dr Aldous (pictured third from left) was part of a strong Australian contingent at the recent International Turfgrass Research Conference in Beijing

PGG Wrightson Turf

The Ryegrass Collection

Don't compromise your turf. Choose the right grasses for your situation and get the best out of your surface

Contains three elite ryegrass cultivars with true winter-activity (from Mediterranean germplasm), ideal for hard wearing sports turf use.

SportsOval™
Turf Rye Blend

Exceptional year-round growth and medium-dark colour. Ideal for high traffic situations.

Arena II
Elite Turf Ryegrass

Industry benchmark for intensively used winter sportsfields. Contains Mediterranean germplasm.

Colosseum
turf ryegrass

A blend of three dark type elite perennial ryegrass cultivars, ideal for use in a wide variety of sports and amenity turf situations

Trio Pro
ELITE RYE BLEND

Exceptional cold weather retention and year-round density

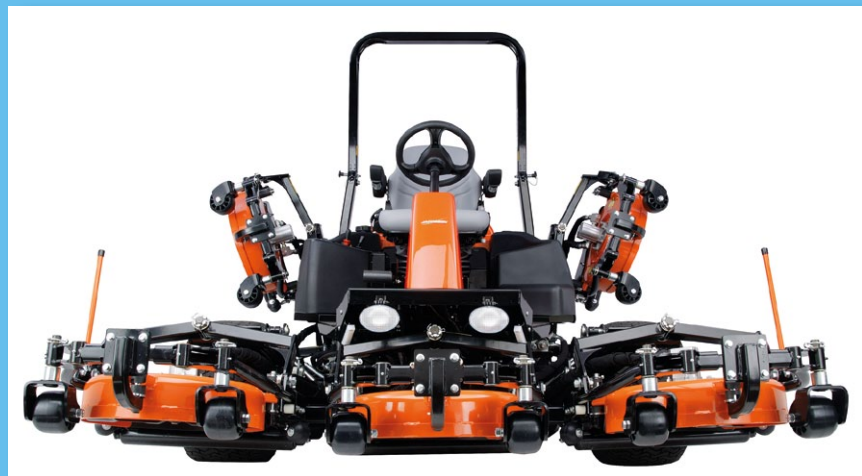
Soprano
Elite Perennial Ryegrass

For further information contact your PGG Wrightson Turf Representative or free phone 1800 DURATURF

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JACOBSEN LAUNCHES NEW ROUGH AND READY WIDE AREA ROTARY



distribute clippings more evenly for a superior after-cut appearance. Using a single spanner, the decks can be easily converted from discharge to mulch in minutes.

With all seven decks engaged, the AR722T has a working width of 3.15 metres and the two outer rear decks feature an impact absorption system; a substantial spring cushions the decks from frontal impacts and shear pins enable breakaway and quick replacement.

For added flexibility, a joystick-controlled hydraulic deck lift system allows the AR722T to mow with five, six or seven decks – providing mow-width flexibility and manoeuvrability around obstacles. Maintenance-free wet parking brakes, integrated into the front wheel motors, deliver safe braking on the steepest slopes and with no linkages or pads to service, maintenance is reduced, as is total cost of ownership.

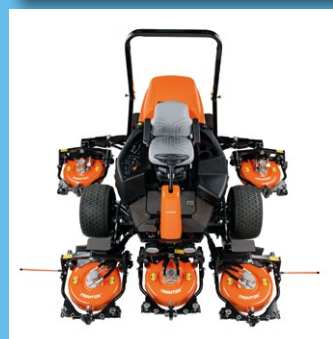
NMIT DEAL SIGNED

In other Jacobsen news, the company, through its Victoria-based dealer Godings, recently committed to a three-year agreement to provide Northern Melbourne Institute of TAFE (NMIT) with new equipment for use on the five golf courses it manages. The new machines will also be used for classroom technical training.

Included in the agreement is an annual scholarship for the top performing student to travel to America and take part in Jacobsen's Future Turf Managers' Programme. This programme sees similar top performing students from the major US colleges being invited to Jacobsen's headquarters in Charlotte, North Carolina for a week-long training, mentoring and networking event.

NMIT's Brian Parr contacted the managing director of Jacobsen's APAC division, Alan Prickett, who flew down from Singapore to conduct the negotiations and sign the agreement. As a result, two new machines have been purchased for use on the golf courses and a walking greens mower donated to NMIT.

For more information on the Jacobsen AR722T visit www.jacobsen.com or contact your Jacobsen dealer.



The new Jacobsen AR722T wide area contour rotary mower has a cutting width of 3.15 metres. Seven fully floating TrimTek contour rotary decks follow undulating ground, reducing the chances of scalping

A GCSA Gold Partner Jacobsen has launched a new wide area contour rotary mower, the AR722T. The new mower, which features seven 56cm rotary cutting decks, is ideal for maintaining intermediate golf roughs, green and tee surrounds and sports and recreation fields.

Designed to boost productivity, with class-leading power, contour following and cutting width flexibility, the AR722T features a rugged and reliable 65.2 hp Kubota turbo-charged diesel engine which allows the mower to maintain performance and blade tip speed in the most challenging terrain without slowing down.

"Golf course managers and sports field groundsman need their rotary mowers to easily handle large areas of grass in a short amount of time," says Lee Kristensen, product manager at Ransomes Jacobsen. "The Jacobsen AR722T is all about productivity, getting more done in less time."

The new AR722T is equipped with the SureTrac parallel-cross-series traction system, which provides superior performance on hills. The AR722T's advanced weight transfer system allows for balancing of the machine's weight between the traction unit and decks for optimal traction and ground following in varying terrains.

The AR722T is also equipped with Jacobsen's TrimTek decks that feature downdraft blades that keep the clippings suspended longer for better mulching results. Three-tiered discharge openings



COMPLETE YEAR FOR DINT

2013 proved to be another year of substantial growth for Dint Golf Solutions, one which was marked by the release of its Complete Putting Cup.

The Complete Putting Cup contains an insert sleeve that can be easily changed in a matter of seconds. Made from heavy duty plastic, the sleeve won't crease or bend. It sits over the top of the cup so when looking from above all that is seen is a white edge. The cup has a bevelled bottom edge and an anodised finish to help it slip easily

into the freshly cut hole. The anodised finish also helps prevent corrosion and eliminates the need for powdercoating.

Since launching the Complete Cup onto the market midway through 2013, in a matter of three months thousands were sold throughout Australia and New Zealand. The Complete Cups were used recently at Royal Sydney Golf Club which hosted the 2013 Emirates Australian Open

Another company highlight was the recent appointment of a Victorian sales manager Damien

Zuch. Zuch brings five years of sales experience in the golf industry to Dint and his appointment means that Dint can now give its Victorian customers a higher level of service and greater accessibility to the Dint product range.

"Part of our growth continues to be from developing the product range in conjunction with the requirements of superintendents," says Dint Golf Solutions operations manager Craig Bartlett. "Very rarely will Dint say no to requests from customers in manufacturing specific products they cannot get anywhere else."

For more information on the Complete Putting Cup or the full range of Dint products, visit www.dint.com.au or call 1800 443 468.

CCI ADDS WOODBAY DE-THATCHER

Country Club International has recently added the Woodbay FDS 9200 turf de-thatcher to its range of golf course maintenance equipment. Manufactured by US-based company Woodbay Turf Technologies, the FDS 9200 is a versatile high-speed de-thatcher that can also be used to prepare turf for overseeding, spreading in topdressing and, where fairway conditions are more sensitive, as a less intrusive alternative to verticutting and scarifying.

The FDS 9200, which attaches to most tractors via a three-point hitch, comprises four free-floating sections which contain a total of 256 40cm spring-loaded steel tines. The tines are much more durable than regular tines and vibrate to remove more wet and dry thatch and loosen infill material. A height control system for the tines allows the operator to quickly adjust the dethatching pressure from light to aggressive.



Used at famous international stadiums such as Wembley, Emirates Stadium (Arsenal FC) as well as a number of NFL grounds, the FDS 9200 has an operating width of 92" (2.34m) and weighs just 227kg. It has been engineered to handle a variety of turf surfaces, from the contours and undulations of a golf course to the flat surfaces associated with sports field maintenance.

Country Club International is currently organising a series of demonstrating days for the FDS 9200 around Australia. For more information about these contact your local CCI representative or visit www.countryclub.com.au



COOPER JOINS SIMPLOT PARTNERS

AGCSA Bronze Partner Simplot Partners has announced the appointment of Phillip Cooper as territory manager in NSW. Cooper (pictured) has extensive experience in the professional turf industry and will be working out of the company's Wetherill Park office. Cooper can be contacted on 0419 813 355 or email phillip.cooper@simplot.com.au.

The Woodbay FDS 9200 high-speed de-thatcher is now available through Country Club International

BREAK THE *POA ANNUA* GERMINATION CYCLE

Dealing with *Poa annua* can take many forms but can usually be separated into either management or control options. The option most suitable is often driven by expectations, budgets or philosophies. None are necessarily wrong and sometimes a range of options are employed concurrently with great success.

Whereas some management strategies will target the regulation of seed head during active development for example, modern control programmes will look to prevent the germination of seed already in the soil previously disseminated by established plants. Nowadays this latter approach forms a key pillar in many turf management programs because surfaces can be maintained in a more consistent manner.

Gone are the days of control strategies relying on post-emergent sprays to retrospectively treat *Poa*. In fact post-emergent treatment is generally avoided as it opens the door for seed to develop. It is a temporary fix and simply hides an underlying problem.

Proactive management using a pre-emergent herbicide is attractive because infestation never eventuates. The pre-emergent approach focuses on breaking the biological cycle of *Poa*, treating well before reproductive stages are reached, preventing the next generation ever existing.

Poa annua can have an unpredictable and lengthy window of



germination. While there is a concentration of germination around the transition from summer into autumn there is usually a continuum of germination that rolls over many months. A single post-emergent spray can treat whatever is present at that time, but does nothing to treat individuals germinating thereafter.

A good pre-emergent treatment can cater for this broad germination, treating as and when it is actually required. This level of responsiveness is unique to the pre-emergent approach but can only really be capitalised on fully if the

product chosen has serious longevity.

Registered in Australia in March 2011, Syngenta's Barricade has the greatest longevity of any pre-emergent herbicide in the Australian turf market providing a level of flexibility turf managers appreciate. Barricade has such a long residual (up to six months), applications can occur well in advance of germination, at a time convenient to turf managers, without compromising late season coverage.

Trying to finely predict *Poa* germination commencement is complex. No two seasons are the same and once missed, the effect of pre-emergent chemistry can be diminished entirely. Not to mention the need to then spray post emergent again, probably more than once to play catch up. Barricade provides an option that is simple and avoids this hassle.



Turf industry R&D

Turf Australia's business and industry development manager Richard Stephens outlines the objectives of the organisation's Strategic Investment Plan which is used to guide turf industry research and development expenditure.



Above: The turf levy is collected primarily to support the profitability, productivity and sustainability of turf production. It is currently set at \$0.015/m² of turf sold from businesses growing and selling more than 20,000m² of turf a year

The Australian turf production industry is large (\$240 million farm gate value per annum) and professional with advanced growing and harvesting techniques along with a streamlined supply chain. In addition to the production sector, the sports turf and turf maintenance sectors are a significant part of the Australian economy, community and our way of life.

THE TURF LEVY

The turf levy is collected primarily to support the profitability, productivity and sustainability of turf production. It is set at \$0.015/m² of turf sold from businesses growing and selling more than 20,000m² of turf a year. The amount collected represents only 0.2 per cent of the total farm gate value of turf produced, which is significantly lower than many other horticulture industries that collect up to 2 per cent, or 10 times that of turf, of their total farm gate value.

Unfortunately, the relatively small levy budget (approximately \$500,000 per annum) is expected to go a long way with 20 per cent of it allocated to turf marketing while the remaining 80 per cent (which is matched dollar for dollar, minus administration costs) is allocated to research and development (R&D).

Turf Australia (TA) is the representative body for Australian turf producers and was responsible for establishing the turf levy in 2006. While Horticulture Australia Limited (HAL) is responsible for the allocation and management of the levy funds, an Industry Advisory Committee (IAC) makes recommendations to HAL on levy expenditure. The IAC is a skills-based committee and has representation from Turf Australia.

R&D PRIORITIES

The Turf IAC recognises the limitations of a small budget, coupled with high expectations from growers as well as the sports turf and turf maintenance sectors. To guide R&D expenditure, a five-year Strategic Investment Plan (SIP) is used to prioritise and determine key investment areas.

The current SIP covers the period 2012-2017 and has recently been reviewed. While its focus on industry communication and extension has been reaffirmed, the IAC, TA and HAL recognise the need to engage more with and provide some support for turf research providers in Australia to help ensure their long-term viability.

As a result, the IAC has embarked on a process of formal engagement with turf research providers, with the aim of exploring their capability, ideas and opportunities for collaboration. In addition, the IAC is very supportive of Voluntary Contribution (VC) projects which provide government matched (non-turf levy) funding to projects that have a strong industry contribution and align with the SIP.

The six objectives of the turf SIP are:

- Grower business capability;
- Communications and extension;
- Environmental sustainability;
- Market knowledge and development;
- Industry capacity, resources and data; and
- Biosecurity and plant health.

HAL FUNDED PROJECTS

All projects funded by HAL, using either levy and/or VC funding, are required to make the information generated available to the entire turf industry. To help this happen, and to encourage professional interaction and collaboration, TA has an extensive industry communication programme, which is primarily aimed at the production sector.

Turf Australia publishes a quarterly industry magazine, fortnightly e-newsletters and maintains and updates an interactive website www.turfaustralia.com.au. In addition to this, TA holds regular seminars and conferences and has leadership development and international networking programmes.

REVIEW OF THE TURF SIP

As mentioned above, the performance and outcomes achieved from the first year of implementing the 2012-2017 SIP was recently reviewed by the IAC. While significant progress was made under each of the six objectives, refinement of some strategies under each objective was considered necessary. These refinements include:

OBJECTIVE 1 - GROWER BUSINESS CAPABILITY

The Grower Business Capability objective has two strategies, the first being the national roll out of the Cost of Production Calculator and the second being the identification and development of another business improvement programme.

The Cost of Production Calculator project is well underway and an increased level of funding has been allocated to achieve this strategy. Its national rollout will also be used to help identify and develop another business improvement programme, scheduled for 2014/15. This objective remains largely unchanged.

OBJECTIVE 2 - COMMUNICATIONS AND EXTENSION

Objective 2 also contains two strategies, being industry communications and ensuring extension from current and past R&D projects. The industry communication project is based on a detailed communications plan and is currently delivering a variety of relevant information via printed, electronic and face-to-face mediums.

A review of the 272 HAL-funded R&D projects has been completed and identified 35 projects for further extension. The IAC identified 11 of these projects for further investigation and possible development, including:

- Establishment and management of salt-tolerant amenity grasses to reduce urban salinity effect (TU06006);
- Development of nutrient management systems for the WA turf industry (TU00007);
- Quantitative analysis of the effects of the use of effluent water on turf (TU01003);
- Amenity grasses for salt-affected parkland in coastal Australia (TU02005);
- Evaluation of soft leaf buffalo cultivars: renovation, mowing heights, and water use (TU09005);
- Economic analysis of the Australian turfgrass industry (TU06004);
- Screening warm-season turfgrasses for Group A herbicide tolerance (TU09009);
- Status assessment of water use research in turf growth and maintenance (TU09033);
- Artificial turf literature review (TU09037);
- Nematode management in turf using chemical alternatives (TU96006, cont'd TU606); and
- Reducing water use by turfgrasses in a Mediterranean environment: evaluation of diverse species (TU96002, cont'd TU602).

OBJECTIVE 3 - ENVIRONMENTAL SUSTAINABILITY

The environmental sustainability objective's sole strategy is to compile information regarding turf environmental credentials in areas such as carbon sequestration, water use, microclimate impact and erosion control.

A project has been completed and a final report submitted to HAL for approval. The IAC has decided to add a future action to this objective, being a detailed economic analysis of the environmental benefits of turf to the community.

OBJECTIVE 4 - MARKET KNOWLEDGE AND MARKET DEVELOPMENT

Objective 4 encompasses three strategies – market research, erosion control market opportunities and new market opportunities. The Sprout Market Research project provides some useful baseline market information while the erosion control project has been delivering significant outcomes, albeit on a reduced budget.



The IAC decided to combine the market research and new market opportunities into a single strategy and allocate additional resources to investigate and measure the current turf market and its opportunities. It is also developing an Australian standard for turf as an erosion control measure.

OBJECTIVE 5 - INDUSTRY CAPACITY, RESOURCES AND DATA

Originally this objective had four key strategies – an industry development resource, leadership capacity, industry data and resourcing – levy. The current industry development project has enabled the TA business and industry development manager to increase leadership capacity by securing three years funding for NxGen Forums, Future Leader funding and by supporting the operations of the state turf associations.

The IAC recognises the difficulties in collecting reliable data on the size and attributes of the industry and, as a result, additional resources have been allocated to achieve this. Ensuring equity in levy collections and ongoing adequate resources to implement this and future SIPs resulted in the allocation of an additional strategy - 'Maximising the levy collection'. Another strategy to ensure that the relevance of these six objectives is regularly reviewed has also been included under this objective.

OBJECTIVE 6 – BIOSECURITY AND PLANT HEALTH

Originally Objective 6 focused solely on biosecurity issues. However, the IAC has identified the need to include plant health and cover issues such as best practice chemical use within the industry. Additional resources have been allocated to achieve this.

OPPORTUNITY FOR SPORTS SECTOR

In the last edition of ATM, John Neylan floated the idea of collecting a 10 cents levy on each round of golf, which could then be used to primarily benefit the sports turf and/or golf course sector. Given the importance of golf and turf sports in Australia, the idea is a good one as it could help improve the widespread quality of playing surfaces and, as a result, lead to a healthier Australian community. 🌱

The Australian turf production industry is large with a farm gate value of \$240 million per annum

To guide turf R&D expenditure, a five-year Strategic Investment Plan (2012-2017) is used to prioritise and determine key investment areas



TGCSA



Danny Gilligan

The most recent TGCSA field day was held on 4 December at Launceston Country Club casino with host superintendent **Steve Wilson**.

A small but quality group were entertained by the day's sponsors Pellows (represented by **Brodie Coulson**) and Toro irrigation (represented by **Clinton Shaw**), who kept everyone up to date with the latest offerings from Toro and the services they provide. **Tom and Judah Rowe** from Hybrid-ag proved to be very informative with their educational presentation on soil biology followed by much banter at our barbecue lunch. Unfortunately the Pellows Saws and Mowers North vs South trophy was held in abeyance due to the rain, as if we hadn't had enough already!

Low spring temperatures and higher than average rainfall played havoc with renovations at numerous venues around the state and delayed the start of the cricket season in some areas causing

many superintendents and curators to question the phenomenon of global warming. Spring growth arrived late and let's hope summer sees some welcome warm weather.

Longford Golf Club superintendant **Ricky Barr**, who has been TGCSA treasurer for the last couple of years, has regretfully resigned from his position due to an occupational change, leaving our committee one short. Tasmania Golf Club superintendent **Dan Gilligan** generously accepted our invitation to be co-opted onto our committee and was a popular choice to take over the role of treasurer. Dan was welcomed back after a long layoff at a committee meeting held at Launceston Country Club casino before our last field day.

MARK JOHNSON
PRESIDENT, TGCSA

NZGCSA

With summer in full swing many of us are no doubt battling on multiple fronts against pest, disease and moisture stress. The climatic and grass variety variance across New Zealand is as wide as that of Australia and there are lessons we can all take from one another.

Parts of Central Otago (South Island) range from -15°C in winter to 40°C in summer, with minimal rainfall, yet less than 100km away the Milford Sound gets seven metres (yes, you read correct) of rain and few frosts.

We really value the relationships we have with our Australian counterparts and the free flow of information and experience. Our differences are often only scale related and plenty of us share the same challenges, whether it's small budgets and high expectations, or sizeable crews and infinite expectations.

FUTURE TURF MANAGERS INITIATIVE

The Board of the NZGCSA is delighted to have signed an agreement with Jacobsen to work together on the Future Turf Managers Initiative (FTMI). This is a Jacobsen initiative in many parts of the world that brings together leading young greenkeepers for extra development and mentoring to give them the tools to go further in the industry.

The FTMI participants will be selected from NZGCSA members who either hold assistant or foreman roles or have been superintendents for less than three years. Costs of involvement are covered by Jacobsen and it is envisaged that the FTMI programme will take place close to conferences or seminars. Topics covered will include team management, career development, communication and presentations and budgeting.

FTMI participation is hugely sought after worldwide as it helps build great support networks between leading superintendents (who act as mentors in the programme), industry leaders and the future leaders of the industry. We look forward to working with Jacobsen to get this successfully underway.

NEW ZEALAND FINE TURF SEMINAR

Andy Wood and the Northland Association team have put together a great programme for the June 2014 NZ Fine Turf Seminar in the far north of New Zealand. Check out the programme and registration details at www.nzgcsa.org.nz. We'd love to see some Australians across here and it may be a good chance to tack on a holiday and explore.

TOURNAMENT INVOLVEMENT

The NZGCSA appreciates the opportunities provided to our members to head across to Australia to be involved with tournament preparations that happen every year and congratulate **Richard Forsyth** (Royal Melbourne) and **Steve Marsden** (Royal Sydney) on their recent tournament successes. Everyone comes back universally praising their level of professionalism and with huge respect for the way they deal with the undoubted pressure.

With the New Zealand Open just around the corner at The Hills it would be great to see some of the tournament traffic heading in the opposite direction and there a number of courses in NZ that would love to take on Australian turfies for their summer seasons.

BRENDAN ALLEN
PRESIDENT, NZGCSA



The Hills in Queenstown will host the NZ Open in late February

There was only one thing that could have made the recent STA QLD annual bus trip any better – an esky! Apart from walking up a bit of a thirst around some of Brisbane's more high profile sporting venues on a warm October day, it couldn't have been much better.

We began the day with breakfast at Ballymore before a near full bus load of members departed for Suncorp Stadium where curator **Mal Caddies** showed us the behind the scenes areas – the media area and change rooms, water tanks and maintenance area. Of course an inspection of the field took place with it looking immaculate just before the start of the A-League season.

From Suncorp it was off to the Tennyson Tennis Centre where **Jon Bonner** gave us a guided tour of this fantastic venue. We were shown the range of different court surfaces they have and viewed the gallery displaying photographs of the 2011 Brisbane River flood that engulfed the whole site soon after the Brisbane International and the ensuing rebuild that followed.

Next stop was the Gabba. **Kevin Mitchell** was busy preparing for the first Ashes Test but took the time to show us the practice nets, the recently re-laid Legend couchgrass outfield and the strip he had selected to be used for the match.



Our final stop was East Leagues Club where, after a great lunch, we inspected the main field, Langlands Park, with **Mark "Macca" McDonald** who recounted some of the history of the home of Easts Tigers. Recently renovated, the field was looking in top shape. Thanks to all of our hosts for giving us their time to show us around their venues.

On the weather front, our extended dry spell finally came to an end towards the end of November, at least here in Brisbane, with several days of good old fashioned afternoon storms. This of course gave the turf a much needed kick start heading into Christmas.

MARTYN HEDLEY
VICE-PRESIDENT, STA QLD

The STA QLD annual bus trip visited key Brisbane venues including Ballymore, Suncorp, Tennyson Tennis Centre and the Gabba



Lincoln Coombes

Golf Course Superintendent
RACV Royal Pines Resort

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Class of 2013 winners (from left)
Andrew Garlick, Chris Varty, Bryce
Pickersgill and Luke Cooney



The lead-up to Christmas seemed to be nothing but party, party, party! One party of particular note was hosted on the evening of Tuesday 26 November with the STA WA, GCSAWA, WABGA and industry supporters coming together to celebrate the 2013 class of graduating turf management students.

The event was held at the magnificent Tompkins on Swan function centre alongside the river in Alfred Cove. It needs to be said that this event could not have been possible without the continued support from all the lecturers and admin at the Challenger Institute of Technology in Murdoch. Thank you to **Jeff Austen**, **Rob Williams** and **John Forrest**.

Although it was a smaller affair in comparison to past years, the night was a comfortable success with plentiful food, ample drink and, obviously, impeccable company. After each student received their graduation/completion certificate, the audience applauded the following four young men as worthy recipients for the evening's select awards:

- **Bayer Award for best student in Certificate of Trade Studies in Turf Management** (sponsored by Bayer CropScience and presented by Stephen Jones of Nuturf): **Chris Varty** (Gosnells Golf Club);
- **Lecturers Choice Award** (sponsored by Lawn Doctor and presented by Dave Parker): **Bryce Pickersgill** (Royal Perth Golf Club);
- **Murray James Memorial Award** for the best bowling greenkeeping apprentice (presented by Joe Cottone of Nuturf): **Andrew Garlick** (Morley/Noranda Recreation Club); and
- **The C.H Bailey & Sons Perpetual Shield** for best WA sports turf graduate (presented by Kim Bailey): **Luke Cooney** (University of Western Australia).

Each award winner received an engraved mug to commemorate their achievement and 12 months custody of their awarded shield or trophy. Congratulations to all four gents on their achievement.

Only a few days later we met for the 'official' STA WA end-of-year association party. This year we started the day at the WACA to watch the WA Warriors take on the Queensland Bulls in the first day of their Bupa Sheffield Shield clash.

Unfortunately due to some unusually persistent drizzle we didn't actually see a ball delivered until almost 2pm! Being natural devotees of having a good time and telling bad jokes, we didn't let that dampen our spirits (pun intended) and we enjoyed the afternoon and what was left of the day's play before stumps.

This was then followed by meeting up with more colleagues at the local Perth & Tattersalls Lawn Bowls Club for more drinks and even worse jokes. A special unexpected highlight for our younger generation on the night was a chance meeting with the lead singer and drummer of Muse, who were relaxing with a private bowl on one of the club's rinks. All up a great day and a fantastic way to finish off the year.

Less than a week later, I found myself enjoying the hospitality of the Water Corporation's Christmas Party held at Eliza House in Kings Park. I was particularly honoured to be invited and must admit to feeling somewhat like a penguin among all the suited sharks. Needless to say, I soldiered on and survived. It's a tough gig sometimes being president!

Plans are already well underway by the STA WA to present an exciting 2014 full of events and activities. I must thank **Hugh Gardner** and **Clint Betts** for their tireless and consistently brilliant work on committee and to **Eva Ricci** in the ever busy chair as WA turf industry development officer. On behalf of all of the STA (WA) I trust you all had a very merry Christmas and wish you all the best for the year ahead.

TONY GUY
PRESIDENT, STA WA

ON THE MOVE

Jeff Allen: Resigned as superintendent at Royal Fremantle Golf Club, WA.

Ricky Barr: Resigned as superintendent from Longford Golf Club, Tas.

Col Caulfield: Resigned as superintendent at Pine Rivers Golf Club, Qld in December after just over six years in the role.

Mark Gahan: Appointed superintendent at Redcliffe Golf Club, Qld (formerly of The Dunes Golf Links, Vic)

Warren Green: Departed as superintendent Peregrine Springs Golf Club, Qld.

Dean Henderson: Resigned as superintendent at Palmer Coolom Resort, Qld in December.

Tim Hicks: Resigned as superintendent at Thurgoona Country Club, NSW.

Craig Molloy: From general manager Shortland Waters Golf Club, NSW to superintendent Cypress Lakes Golf Club.

I hope everyone has had a fantastic Christmas and New Year with plenty of rest, fun and family. As we now head back to work, all that fun will shortly be a distant memory.

It was a very busy end to 2013 for the STA Vic. During November we held a chemical safety day at Trinity Grammar sponsored by Active Safety. The 70-odd delegates that attended heard informative talks from **John Neylan** on record keeping, due diligence and corporate governance, while a representative from WorkSafe Victoria spoke about chemicals and the legislation regarding them.

Terry Muir from e-par also reviewed what has recently happened in NSW and what the industry can do differently. It was a very informative day covering topics that are becoming more and more important in our workplaces.

The day also included the STA Vic Annual General Meeting. This was a fairly brief part of the day giving our members an overview of how we have tracked the past year. The committee from last year was re-elected unopposed, although we have a couple of positions to fill. If you are interested contact (03) 9791 6900 or vic@sportsturf.asn.au.

November also saw the inaugural Sports Field & Grounds Forum held by Toro Australia. This was a fantastic couple of days down at The Sands,



Torquay where Toro showcased its equipment to turf managers from all over Australia, from schools, council, contractors and stadiums.

The forum covered equipment and irrigation with small informative group discussions on various equipment that Toro has to offer, both now and into the future. There was also a short presentation from Syngenta during the forum on spraying and nozzles.

This was a wonderful experience and we thank Toro and look forward to more of these events and smaller regional events into the future.

From this event Toro also highlighted their continued support to the industry by awarding a mentor to assist the winner of the National Sports Turf Graduate Award. This went to **Mick Smith** from Scotch College and the STA Vic congratulates him on the honour.



Toro Australia's inaugural Sports Field & Grounds Forum was held at The Sands, Torquay in November with turf managers drawn from across Australia

NATHAN TOVEY
PRESIDENT, STA VIC



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Westpac Regional Stadium will host a 2015 Cricket World Cup quarter final match

2013 was a busy year for the STANZ with the highlight the bi-annual national turf conference held in Hamilton in June. It was another very successful event bringing together the NZ Recreation Association, Bowls NZ, NZGCSA, NZ Cricket and STANZ over three days.

Special thanks goes to **Jason Weller** from the STANZ executive whom for the second time over the past four years pulled together an outstanding programme for all delegates. Congratulations to **Gerald Price** from QEII Park in Christchurch who was the recipient of the STANZ Distinguished Service Award to the turf industry.

Looking forward, the 2015 Cricket World Cup (CWC) draw has been released. As co-hosts with our mates across the 'Ditch', New Zealand has secured an even split of 23 games, including a quarter-final at Wellington Regional Stadium and semi-final at Eden Park (Auckland). A total of seven venues will be used throughout the six-week tournament and in addition to the above venues Hagley Oval (Christchurch), Seddon Park (Hamilton), Saxton Oval (Nelson), University Oval

(Dunedin) and McLean Park (Napier) will host three pool games each.

Prior to the main event, New Zealand will also host the Cricket World Cup qualifier event from 13 January to 1 February 2014. Ten teams (Canada, Hong Kong, Namibia, Kenya, Nepal, Netherlands, PNG, Uganda, UAE and Scotland) will fight it out for the two remaining spots in the 2015 CWC with venues to be used including Mt Maunganui, New Plymouth, Christchurch, Lincoln, Rangiora and Queenstown. With a broadcast audience tipped at over one billion people, that's a lot of eyes on our turf Down Under!

2015 will also see New Zealand host the FIFA Under-20 World Cup. This is also a massive global event with the next generation of football stars gracing our playing surfaces. We will keep you right up to date as preparations for these major global events gear up over the next 18 months. The legacy effect for our industry can't be underestimated.

IAN MCKENDRY
CHAIRMAN, STANZ

It's interesting to look back on previous reports and make comparisons of the weather patterns.

This time last year I wrote of the extremely dry spring after an abundance of rain during the winter. This spring, rainfall has been plentiful but temperatures cool with many overcast, windy days – great weather if you are maintaining couch, not so good if you are wanting to grow it. People have spoken of the shift in seasons with summer conditions prolonging into the autumn, so it will be interesting to see how the rest of summer pans out.

The VGCSA is pleased to announce the winners of its annual Superintendent and Trade Recognition Awards. Royal Melbourne course superintendent **Richard Forsyth** is this year's winner of the Superintendent Recognition Award, while the recently retired **Charlie Payne** has been named as recipient of the Trade Recognition Award.

Most of us would be aware of what Richard has achieved in his career. He recently hosted two major tournaments (Talisker Masters and World Cup) in November, as well as the Presidents Cup in 2011. There have been many major projects undertaken since Richard started at Royal Melbourne in among preparing for these tournaments.

Richard is always available to share his knowledge and experience and is only too willing to assist where he can to help others in the industry. Richard is an excellent role model and a deserved winner of the award.

Charlie recently retired from Godings after nearly 30 years in the turf industry. Over that time

Charlie has been involved with Sunbeam/Victa (Ransomes agents), Textron and Godings. Charlie has been a constant supporter of the VGCSA who often attended meetings and would be involved in machinery demonstrations. Congratulations Charlie and we wish you well in retirement.

The VGCSA has finalised its meeting venues for 2014. The VGCSA committee is grateful to those offering their facilities for our meetings. The venues confirmed (dates TBC) are:

- **March – Educational Tour:** Moonah Links, The National and Portsea golf clubs
- **May – AGM:** Commonwealth Golf Club
- **June – 21C/Foreman Education Day:** Chisholm TAFE – Rosebud Campus
- **Aug – Country/21C Day:** Corowa Golf Club
- **Sept – Education Day:** Spring Valley Golf Club
- **Nov – Bayer VGCSA Golf Day:** Southern GC

2013 was a very positive year for the VGCSA which makes the work and decisions of the committee more rewarding. Our generous sponsors have again committed to supporting us in 2014. This has a direct correlation to what we as a committee are able to offer our members throughout the year in terms of resources and events. Continued success can only be achieved if all facets of the VGCSA continue to gel, support and commit to the opportunities that are available during the year. It is pleasing to see this happen on a regular basis.

STEVEN HEWITT
PRESIDENT, VGCSA

STA ACT REGION



It's hard to believe we have bid 2013 farewell already and are looking forward to a new year. The past year seemed to fly by, as they all do these days. Naturally it's a very busy time of year but it's very important to find time to spend with family and friends and our thoughts go out to loved ones who are no longer with us.

Weatherwise in Canberra we are starting to get some warmer days on a more regular basis although every now and again we get the usual cold snap as evidenced recently with our coldest December day for 15 years – just 15°C. Rain has also been scarce although I imagine this to be the case nationally.

The Living Turf Student Award nominees this year are **Daniel Berton** (Gungahlin Lakes Golf Club), **Kurt Eldridge** (Bermagui Golf Club), **Simon Snedden** (Young Golf Club) and **Tim Jopling**

(Australian Institute of Sport). Interviews were conducted before Christmas to determine this year's winner and we look forward to announcing the successful candidate in coming editions.

A couple of dates to remember for 2014 include the STA ACT Turf Seminar on 30 July at the Tuggeranong Town Sports Centre. The STA ACT Golf Day has been changed to 15 April and will again be held at Gold Creek Country Club.

On behalf of everyone at the STA ACT Region I hope everyone had a safe and merry Christmas and New Year and thanks to Brett Robinson and the team at the AGCSA and Australian Turfgrass Management Journal for their continued support.

DANNY HULL
COMMITTEE, STA ACT REGION

NSWGCSA



As we look back at the last two months of golf tournaments, big and small, it is well deserved congratulations that need to go to all superintendents and their crews for the magnificent way these courses have been presented and the way that these efforts represent our industry. Considering the different extremes of weather being experienced across the country it is even more of an achievement.

At the same time the World Cup was being played at Royal Melbourne, **Martyn Black** at Castle Hill Country Club was hosting the NSW Open, the first time it has been held in Sydney for a number of years. As our weather seems to work these days, there was virtually no rain and high temperatures for four months prior to the tournament, with Castle Hill being fortunate to have access to recycled water to prepare the course and have PGR's in place.

Of course this all changed a week and a half before the event with the rain starting to fall with the final tally being about 150mm for the 14 days up to and including the event. During the first three days of the tournament there was one delay for fog (Thursday morning) and four delays due to lightning and rain, but they still finished all four rounds on Sunday. Blacky has told me the sponsors were very happy with the outcome as their guests were captive audiences in the clubhouse during those delays!

The weather prevented Martyn from cutting fairways all tournament, but PGR's saved the day with the course looking fantastic and playing very well despite the weather. Amateur **Ben Eccles** even fired a closing round 62 to set a new course record. The dramas didn't finish there for Blacky and with the course being so wet it took until 5 December to get the last of the infrastructure off the course.

Fortunately **Steve Marsden** didn't have the same headaches at Royal Sydney during the Australian Open, setting the stage for a finish equally as good as the Talisker Masters two weeks prior, although this time without the desired outcome for **Adam Scott**. (See 'Opening up', pages 24-31 in this edition which looks back on both the NSW and Australian Opens – Ed).

During the Open I read an article by golf journalist **John Huggan**, that was titled 'Australia: Home of (interesting) golf' pointing out that the nature of the golf courses used for tournaments and the way they are prepared in this country lent themselves to forcing players to make decisions about the shot to be played and also making them play a variety of shots.

I believe this sentiment also applies to a lot of the courses in this country meaning golfers in Australia are doubly blessed with good layouts being presented in better than average condition most of the time.

Away from the tournament spotlight, the NSWGCSA is reaching the final stages of its 'Minimum Compliance' pilot programme with in-field audits being carried out followed by a series of assessment workshops in early 2014. These workshops will allow the NSWGCSA to then make informed decisions about the future direction of a 'Minimum Compliance Programme' to be rolled out for all NSW golf clubs to be a part of.

Hopefully everyone had a good Christmas with a bit of rain and normal temperatures so we can start the New Year in good condition.

STEVEN JACOBSEN
PRESIDENT, NSWGCSA



Castle Hill superintendent **Martyn Black** and Perception PR's **Belinda Hill** didn't let weather delays dampen their enthusiasm at the recent Gloria Jeans NSW Open



GCSAQ Award winners, Royal Queensland assistant Adam Mills (left) and Horton Park turf technician Phil Newton, worked at Royal Melbourne Golf Club when it hosted the Talisker Masters and ISPS Handa World Cup of Golf. Mills was sponsored by KC Turf Equipment/Jacobsen and Mills by Nuturf

Some pretty good spring and early summer storms have put a smile on the face of most south east Queensland superintendents as things were looking pretty dire water wise for a while. Most clubs relying on storm water run-off were just about out of water with many selectively irrigating to ensure that supplies lasted.

Kirsty Herring, superintendent at Cooroy Golf Club inland from Noosa Heads, reported on her water woes: "We did have to pump water from the dam on 9 for a brief period of time and irrigation was down to a minimum, however, thanks to 100mm of rain in the past week the creek is back up and water is flowing from the top dam to the bottom dam again." Somewhere between 4-8 inches fell over most areas in October although a lot of that was in heavy downpours which had no great benefit for turf but helped fill up the dams.

There has been a little bit of movement in the ranks in Queensland recently with a number of new appointments and departures. Redcliffe Golf Club has appointed **Mark Gahan** as course superintendent. Mark, who many will know from his tenure at The Dunes Golf Links on Victoria's Mornington Peninsula, comes to the Sunshine State with a wealth of experience in golf course management and construction with the club keen to start implementing course architect **Richard Chamberlain's** master plan.

At Pine Rivers, **Col Caulfield** has resigned and is looking to broaden his horizons within the golf industry. Further north on the Sunshine Coast, **Dean Henderson** has pulled up stumps at Palmer Coolum, which has been home for the past four years, while at Peregian Springs **Warren Green** returned from annual leave to discover he no longer had a job!

On a brighter note, Ipswich Golf Club is toasting its reopening after being forced to close earlier in the year. The Queensland Times paper reported recently

that "... a company associated with Sirromet Wines has bought the club. It is another step in a foray into Ipswich for Sirromet Wines owner **Terry Morris** and fellow Gold Coast businessman **Dean Merrell** who have bought eight pubs around Ipswich."

And even better news for lovers of Kooralbyn Valley Golf Course, which is not far from Beaudesert, with the news of a successful sale and subsequent redevelopment of the golf course. Kooralbyn is about an hour's drive from the Gold Coast and was designed by **Desmond Muirhead** who was quoted as saying "Kooralbyn was the most perfect site I have worked with and the surrounding countryside reminds me of a scene from Brigadoon."

The course opened in 1979 and was originally going to be the focal point of a then multi-million dollar country resort. Unfortunately the early 80's coincided with the development of resort courses on the Gold Coast and the difficult drive through the hinterland to get to Kooralbyn at the time deterred many from making the trip.

They used to hold a 'Copperhead Challenge' at the course off the back tees and anyone who broke their handicap would receive two dozen balls. According to former Sawtell GC superintendent **Trevor Ridge**, who recently moved to the area, the course has still been maintained in a very basic form and it looks like he may well be on hand to assist with the redevelopment.

Elsewhere, intrepid Indooroopilly superintendent **Charlie Giffard** has been observing some 328 Tifgreen 'off types' on his greens over the past few years and has come up with a very promising strain that he has just planted into a green. Given the speed of the greens at this year's GCSAQ AGM, we hope it's a slow variety!! Stay tuned for further news.

Pat Pauli at Horton Park Golf Club reports that construction of the new course is moving along nicely with four holes and two greens already grassed. Work is being conducted at a feverish pace in an attempt to get as much of the lower areas finished off before the wet season starts. Pat also reports that his back is fully recovered.

Finally, I recently caught up with **Peter Sawyer**, one of the founding fathers of the AGCSA, and he looks as fit as ever. Peter has spent the past few years on a variety of golf course development projects throughout Southeast Asia in partnership with fellow former Victorian **Gavan Wilson** through their company Links Golf Services. Peter also reported that his 15-year-old son Adam is currently in the UK trying out for a soccer scholarship which is a great achievement.

PETER LONERGAN
PRESIDENT, GCSAQ



Race results so far...

Grand Prix continues to manoeuvre itself for a position within new and existing sportsfield installations.

Recently the ACT Government approved its use on the new surface at Manuka Oval in Canberra. The decision was based around the trial results that have been undertaken at Parliament House and other locations, in and around Canberra, where Grand Prix has performed very well.

Grand Prix is the turf of choice for the Prime Minister's XI game in the middle of January, which is always a crowd favourite.

The surface of the Campbelltown Sports Stadium, home of the West Tigers Rugby League Club, is now covered in 12,000m² of Grand Prix.

Several local councils in Victoria are using Grand Prix for the benefits of its high wearing capabilities and low seed head production. Planting of Grand Prix stock for the Eastern Golf Club has begun at Lilydale Instant Lawn's farm and will be in great shape when ready to be laid and or planted in the early parts of 2014.

For improved wear resistance, high density and a substantial reduction in seed head production, Grand Prix offers advantages over other couch varieties that curators and turf managers from all sports should consider.

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- Mark Jennings Superintendent Box Hill Golf Club

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