

Winter 2024

San Doctor

collaborating with our GPs
to provide coordinated
community care



Message from Brett Goods, Chief Executive Officer

It is pleasing to see so many doctors participate in our editions of San Doctor this year, each of them sharing information from their fields that is relevant to our GP community.

We hope that this resource provides you with insight into treatment and conditions that may be present in patients at your clinic.

In this issue, you will read about a minimally-invasive technique that uses an endoscope to treat surgical pathologies of spine.

You will also read about the diagnosis for a condition known as Ischaemia with No Obstructive Coronary Artery disease (INOCA), as well as an exciting trial centred around a common recurring skin condition.

The selection of articles in this edition demonstrates the continued commitment of Sydney Adventist Hospital to provide the best possible care to our community.

Brett Goods, CEO

**Chief Executive Officer
Adventist HealthCare Limited**

AN ARTICLE
FEATURING

Dr Shanu Gambhir

Endoscopic spine surgery comes to the San

Endoscopic spine surgery is a minimally-invasive surgical technique that uses a small, tube-like instrument called an endoscope to treat surgical pathologies of spine.

A high-definition endoscope (which has a light and camera) is used to access and operate on the spine through a small incision – usually 7-9mm – compared to the incision size of 2-4cm used for traditional ‘open’ spinal surgery approach.

“Endoscopic spine surgery has been described as an ultra minimally-invasive surgical approach,” said Dr Shanu Gambhir, a neurosurgeon and spine surgeon at the San. “We’re able to treat many spine-related pathologies such as disc herniations, sciatica and spinal stenosis.”

Dr Gambhir uses either the endoscopic spine surgery technique or the traditional open-incision method – depending on the most appropriate surgical approach for each individual patient.

“I treat about 80% of spinal pathology with endoscopic spine surgery, and about 20% of spinal pathology using the open technique. Endoscopic spine surgery is the least invasive way of doing spine surgery that we have available to us today,” added Dr Gambhir.

“Endoscopic spine surgery is performed under constant irrigation which improves the visualisation of neural structures and, overall, results in less trauma to tissues, muscles and adjacent joints,” said Dr Gambhir. “Less ‘collateral damage’ is one of the benefits of the endoscopic approach to spine surgery, resulting in less post-op pain and quicker recovery.”

The endoscopic approach uses a high-definition imaging camera and screen. “The anatomy is clearer – compared to traditional techniques – as it is magnified and projected on a 4K screen (4,000 pixels) which gives us 360-degree view of nerves and pathology being treated,” said Dr Gambhir. “Endoscopic technology is constantly evolving, leading to more spinal pathologies now being treated this way.”

“We’re very happy to be bringing the endoscopic spine surgery technique to the San,” added Dr Gambhir. “As with any surgical procedure there are risks, and the risk profile of the endoscopic spine technique is similar to the traditional open surgery method.”

Dr Gambhir presented the research findings of 100 endoscopic spine surgery cases at the Neurosurgical Society of Australasia conference in September last year. “We found that infection rates were lower, and that the overall complication profile was similar to the current open techniques.”

“The future of endoscopic spine surgery is a very exciting area of spine surgery,” said Dr Gambhir. “In the next 10 years, augmented reality, AI and robotics will be combined with endoscopes, generating further innovation, precision and some automation of surgical procedures – leading to better outcomes and less complications for patients.”



Outcome	2 weeks			6 weeks			6 months		12 months			
	PTED (n=169)	OM (n=240)	Between group difference (95% CI)	PTED (n=170)	OM (n=249)	Between group difference (95% CI)	PTED (n=163)	OM (n=235)	Between group difference (95% CI)	PTED (n=168)	OM (n=245)	Between group difference (95% CI)
Primary outcome												
VAS for leg pain*	24.5 (7.0-53.5)	25.0 (8.0-54.8)	-0.5 (-4.5 to 3.8)	18 (4.8-47.3)	21.0 (6.5-48.5)	0.2 (-3.6 to 3.6)	11.5 (1.0-28.0)	14.5 (3.0-46.0)	4.9 (1.2 to 8.5)	7.0 (1.0-30.0)	16.0 (2.0-53.5)	7.1 (2.8 to 11.3)
Secondary outcomes												
Oswestry Disability Index†	32.0 (18.0-48.0)	41.0 (24.4-53.3)	6.5 (4.0 to 8.9)	20.0 (8.0-32.0)	24.0 (12.0-36.0)	3.4 (1.6 to 5.4)	11.1 (4.0-20.0)	14.0 (4.0-26.5)	3.1 (0.9 to 5.2)	10.0 (2.0-17.8)	12.7 (2.2-28.4)	5.3 (3.0 to 7.7)
VAS for back pain†	28.0 (11.5-48.0)	29.5 (12.3-50.8)	1.8 (-1.9 to 5.4)	21.0 (7.8-46.3)	22.0 (9.0-49.0)	0.9 (-2.2 to 4.1)	15.5 (4.0-42.0)	24.5 (10.0-53.0)	6.2 (2.8 to 10.0)	16.0 (3.0-38.8)	21.0 (5.0-55.0)	6.0 (2.0 to 10.0)
VAS for quality of life‡	61.0 (48.0-75.0)	56.5 (36.3-73.0)	-6.8 (-9.8 to -3.9)	70.0 (55.8-81.3)	64.0 (47.0-75.5)	-7.8 (-10.3 to -5.4)	73.0 (61.0-82.0)	68.0 (56.0-81.0)	-4.3 (-7.2 to -1.3)	76.5 (61.8-68.8)	70.5 (54.3-83.0)	-6.2 (-9.2 to -3.2)
SF-36 physical component summary§	37.8 (33.0-44.1)	36.9 (32.4-41.6)	-1.3 (-2.7 to -0.1)	43.1 (36.4-48.7)	41.0 (33.6-46.8)	-1.9 (-3.0 to -0.7)	48.4 (41.3-54.6)	46.1 (38.2-53.5)	-1.8 (-3.0 to -0.6)	50.8 (42.3-56.5)	46.4 (38.7-53.8)	-2.8 (-4.1 to -1.6)
SF-36 mental component summary§	45.8 (34.3-53.2)	42.7 (42.9-53.4)	-1.3 (-3.1 to 0.5)	53.8 (41.5-57.1)	50.1 (39.3-55.0)	-2.3 (-3.5 to -1.0)	54.3 (48.4-57.3)	53.8 (44.4-57.2)	-2.1 (-3.4 to -0.7)	54.6 (50.1-57.1)	53.8 (46.3-56.8)	-2.1 (-3.4 to -0.9)
Proportion recovered from symptoms¶	89 (53%)	118 (49%)	1.2 (0.7 to 2.2)	113 (66%)	148 (59%)	1.5 (0.8 to 2.6)	120 (74%)	154 (66%)	1.6 (0.9 to 3.0)	133 (79%)	157 (64%)	2.7 (1.4 to 5.2)
Proportion recovered from leg pain¶	98 (58%)	144 (60%)	0.8 (0.5 to 1.5)	119 (70%)	168 (67%)	1.1 (0.6 to 2.0)	125 (77%)	165 (70%)	1.5 (0.8 to 2.9)	133 (79%)	169 (69%)	2.0 (1.0 to 3.7)
Proportion satisfied with change in symptoms¶	97 (57%)	124 (52%)	1.3 (0.7 to 2.4)	112 (66%)	149 (60%)	1.3 (0.7 to 2.4)	119 (73%)	143 (61%)	2.1 (1.1 to 4.0)	127 (76%)	150 (61%)	2.6 (1.4 to 4.8)
Proportion satisfied with result of treatment¶	106 (63%)	140 (58%)	1.2 (0.7 to 2.2)	121 (71%)	155 (62%)	1.7 (0.9 to 3.1)	124 (76%)	155 (66%)	2.0 (1.0 to 3.8)	133 (79%)	161 (66%)	2.6 (1.3 to 5.0)

OM=open microdiscectomy; PTED=percutaneous transforaminal endoscopic discectomy; VAS=visual analogue scale. Median values of continuous outcomes are shown, with interquartile ranges. Between group differences, adjusted for baseline scores and centres, are shown with 95% confidence intervals (CIs). For Likert scales, proportions are shown with odds ratio, adjusted for centre, and respective 95% CIs.
 *Scores intensity of leg and back pain from 0 to 100, with higher scores indicating more pain.
 †Measures functional disability from 0 to 100, with higher scores indicating more functional disability.
 ‡Scores general quality of life from 0 to 100, with higher scores indicating better quality of life.
 §SF-36 score can be summarised in physical component summary and mental component summary using normative data. Higher scores indicate better quality of life.
 ¶Measured by dichotomising Likert scales with recovered or satisfied defined as complete or nearly complete recovery/satisfaction.

Table 3 | Surgical outcomes and complications of patients who had surgery, according to intention-to-treat analysis. Values are numbers (percentages) unless stated otherwise

Outcome/complication	PTED (n=171)	Open microdiscectomy (n=249)
Median (IQR) duration of surgery, minutes	30.0 (23.0-43.0)	30.0 (23.0-40.0)
Estimated blood loss <10 mL*	125 (73)	68 (27)
Position of disc herniation†:		
Median	15 (9)	19 (8)
Paramedian	125 (73)	178 (71)
Intraforaminal	20 (12)	33 (13)
Extraforaminal	11 (6)	20 (8)
Total intraoperative complications:		
Dural tear	0	8 (3)
Nerve root injury	0	1 (<1)
Exploration on wrong level	1 (1)	0
Other	0	0
Had procedure other than assigned:		
PTED	0	5 (2)
Open microdiscectomy	3 (2)	0
Tubular discectomy	0	10 (4)
Total postoperative complications:		
Wound haematoma	0	1 (<1)
Wound infection	0	3 (1)
Urinary tract infection	0	0
Cerebrospinal fluid leakage‡	0	2 (<1)
Micturition disturbances	0	1 (<1)
Deep venous thrombosis in the leg	0	1 (<1)
Transient increase in neurological deficit	2 (1)	0
Other	0	0
Timing of mobilisation:		
Day of surgery	171 (100)	209 (84)
Day 1 after surgery	0	39 (16)
Day 2 after surgery	0	1 (<1)
Median (IQR) length of stay in hospital, nights	0 (0-0)	1 (1.0-1.0)
Day of discharge:		
Day of surgery	161 (94)	14 (6)
Day 1 after surgery	10 (6)	229 (92)
Day 2 or later	0	6 (2)
Mean (SD) length of scar at 6 weeks§, mm	11.7 (9.2)	38.4 (15.0)
Repeated surgery within 1 year:		
Re-discectomy for disc herniation	9 (5)	14 (6)¶
Disc herniation on other level	9 (5)	12 (5)
Stenosis	0	0
Instrumented fusion for recurrent disc herniation	0	2 (1)
Analgesic use after discharge:		
Two weeks after surgery	(n=169)	(n=241)
Non-opioid analgesics	84 (50)	133 (55)
Opioid analgesics	22 (13)	70 (29)
Six months after surgery	(n=163)	(n=236)
Non-opioid analgesics	41 (25)	50 (21)
Opioid analgesics	8 (5)	21 (9)
Twelve months after surgery	(n=168)	(n=244)
Non-opioid analgesics	23 (14)	52 (21)
Opioid analgesics	9 (5)	24 (10)

IQR=interquartile range; PTED=percutaneous transforaminal endoscopic discectomy; SD=standard deviation.
 *Blood loss was estimated by surgeons' visual estimate in categories.
 †One disc herniation was both intraforaminal and extraforaminal.
 ‡One case necessitated external lumbar drainage.
 §Data on scar size was available for 162 patients in PTED group and 224 in open microdiscectomy group.
 ¶One patient had two re-discectomies within one year, and one patient had instrumented fusion after re-discectomy within one year.

Dr Shanu Gambhir

MBChB, MS, FRACS
(Neurosurgery -
Brain and Spine)

Dr Shanu Gambhir is an Australian trained Neurosurgeon and Spine surgeon. He specialises in minimally invasive spine surgery, endoscopic surgery, complex spinal and cranial surgery. He practices a minimalistic approach to ensure the best patient outcomes.



Dr Gambhir completed his advanced training in Neurosurgery through the Royal Australasian College of Surgeon (RACS) at major tertiary hospitals in Australia - Royal North Shore Hospital, St George Hospital, St Vincent's Hospital, Westmead Public Hospital and Christchurch Hospital in New Zealand. He is a Fellow of the Royal Australasian College of Surgeons (RACS), member of the Neurosurgical Society of Australasia (NSA) and Australian Medical Association (AMA).

He completed his undergraduate medical degree at the university of Otago in New Zealand and a Master of Surgery in Neurosurgery (MS) at The University of Sydney. He is actively involved in research as well as teaching.

Dr Gambhir has specific interest in the following areas:

- Minimally invasive spine surgery
- Endoscopic surgery
- Complex cranial and spinal surgery
- Degenerative spinal conditions
- Brain and spinal tumours
- Brain and spinal trauma
- Congenital disorders

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Benefits of endoscopic spine surgery

- Smaller incisions
- Less tissue damage
- Reduced blood loss
- Shorter hospital stay
- Quicker recovery and return-to-work

AN ARTICLE
BY

Dr Ru-Dee Ting

Ischaemic heart disease

Introduction:

Ischaemic heart disease is a major cause of morbidity and mortality. Coronary atherosclerosis is a well recognised cause but patients with angina symptoms and no obstructive coronary lesions may have a condition known as Ischaemia with No Obstructive Coronary Artery disease (INOCA). The 2021 ACC/AHA chest pain guidelines redefined coronary disease to include any degree of coronary stenosis, including INOCA⁽¹⁾.

INOCA encompasses coronary vasospasm, microvascular angina and microvascular spasm. These conditions can be underdiagnosed because traditional coronary angiography is not able to adequately detect these disorders

Coronary vasomotion disorders:

The epicardial coronary arteries run along the surface of the heart and can be seen macroscopically on angiography. Epicardial coronary spasm results in vasospastic angina (also known as variant angina or Prinzmetal angina). Microvascular angina can be caused by microvascular spasm but can also involve impaired coronary vasodilatation or microvascular obstruction (resulting in increased microvascular resistance). These disorders result in myocardial ischaemia due to a reduction in myocardial perfusion.

Coronary vasomotion disorders can occur in conjunction with traditional epicardial stenoses, and current diagnostic testing is limited in these situations. Invasive testing for vasomotion disorders is most useful in patients with no epicardial obstruction⁽²⁾.

Diagnosis:

Traditional coronary angiography involves obtaining arterial access (usually via radial or femoral artery) and passing a catheter into the aortic root and engaging the coronary arteries. Contrast dye is then injected directly into the coronary arteries and fluoroscopic images obtained. A coronary angiogram does not assess coronary vascular function and does not visualise the coronary arterioles or capillaries (Fig 1). Coronary angiography has a spatial resolution of about 0.3mm which is inadequate to image the microvasculature. There are clear guideline recommendations regarding coronary angiography in patients with suspected epicardial disease. However, many guidelines do not emphasise the additional step of testing of coronary vascular function resulting in clinicians not assessing for these conditions and resulting in diagnostic uncertainty.

In patients in whom INOCA is suspected, adjunctive tests performed at the time of coronary angiography should be considered. Spasm can be diagnosed with an acetylcholine (ACh) challenge and microvascular obstruction can be diagnosed with measurement of coronary flow reserve (CFR) and the index of microvascular resistance (IMR).

Intracoronary ACh can be delivered via the coronary catheters and coronary angiography performed to look for spasm of the arteries in real time. CFR and IMR are measured using specialised coronary wires that are passed down into the coronary arteries and measure intracoronary pressures which can then be imputed to flow. Calculation of fractional flow reserve (FFR), CFR and IMR inform the state of flow at different levels in the coronary arterial tree (Fig 2).

Identification of patients with specific disease processes and mechanisms allows for more targeted therapy. It is also important to exclude patients who experience chest discomfort but have no cardiac/coronary pathology.

Prognosis:

Patients with undiagnosed chest pain are at increased risk of cardiovascular (CV) events for at least 5 years. Women have a greater incidence of INOCA and are more likely to be dismissed from medical care. INOCA is associated with an increased risk of CV events and reduced quality of life. Women with INOCA have a 10-fold increase in heart failure with preserved ejection fraction and stroke⁽³⁾. Older age, diabetes, hypertension, and smoking predict worse outcomes for patients with INOCA⁽⁴⁾.

Treatment:

Hypertension and dyslipidaemia are associated with coronary microvascular disease and vasospasm. Hypertensive microvasculature impairs perfusion and dyslipidaemia contributes to coronary endothelial dysfunction. Insulin resistance and metabolic syndrome are also associated with microvascular dysfunction. Therefore, lifestyle modification and pharmacological treatment with statins and ACE inhibitors can target coronary endothelial dysfunction.

Statins improve flow mediated dilation in INOCA and have been shown to improve coronary flow reserve and coronary microcirculation. Betablockers are beneficial in microvascular angina, in particular, nebivolol has vasodilatory effects and has demonstrated antianginal effects in patients with INOCA. Calcium channel blockers like diltiazem are useful in coronary spasm and microvascular spasm. They have less effect on improving coronary flow reserve⁽⁵⁾.

Short acting nitrates are beneficial in patients with coronary spasm, but its efficacy is inconclusive in patients with microvascular dysfunction, possibly due to different signalling pathways in the epicardial arteries and micro vessels⁽⁶⁾. Long-acting nitrates have not been shown to be of benefit in microvascular dysfunction but have a role in epicardial coronary disease⁽⁷⁾.

Second line therapies include nicorandil, ivabradine, and trimetazidine.

Summary:

INOCA is a difficult entity to diagnose due to its heterogeneity. Patients with chest pain without obstructive coronary disease should be considered for further testing for INOCA via angiography and microvascular study. It is important to confirm a diagnosis of INOCA given its association with increased CV events. Excluding INOCA avoids unnecessary medication prescription. Practice guidelines provide defined treatment protocols, and this translates to improve quality of life for patients with these conditions⁽⁸⁾.

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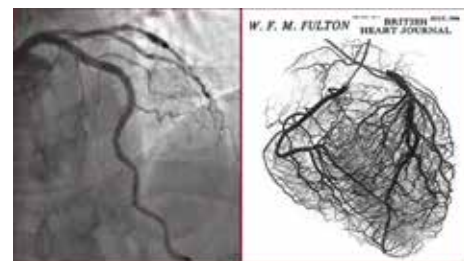


Fig 1: Left panel: Coronary angiogram visualising epicardial arteries, resolution to 0.3mm. Right panel: Ex vivo arteriogram demonstrating coronary microvasculature, resolution 0.03mm (2).

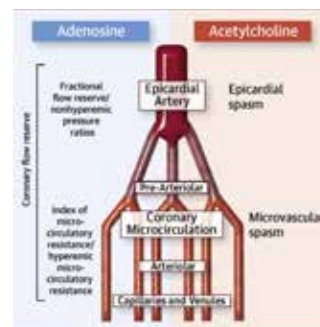


Fig 2: Functional testing of coronary arteries at different levels of the vascular tree (2).



Dr Ru-Dee Ting

MBBS, FRACP, PhD, MClInt (R), FCSANZ

Dr Ting obtained his degree in Medicine and Surgery at the University of Melbourne. He trained in cardiology at the Royal Prince Alfred Hospital and completed an interventional fellowship at St Michael's Hospital, University of Toronto, Canada. He is a fellow of the Royal Australasian College of Physicians and a fellow of the Cardiac Society of Australia and New Zealand.

He specialises in coronary angioplasty, rotational atherectomy, diagnostic intracoronary imaging, right heart catheterisation and haemodynamic testing.

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AN ARTICLE
FEATURING**Professor
Gerald Fogarty**

The ROSEND trial is opening at Sydney Adventist Hospital!

The ROSEND trial is a randomised controlled trial (RCT) of a type of radiotherapy (RT) called volumetric modulated arc therapy (VMAT) versus dermatological standard of care (DSOC) treatment for recalcitrant rosacea.

Rosacea is a common chronic relapsing inflammatory skin condition typically characterised by redness or flushing of the central face. The cause is unknown and there is no known durable cure. Symptomatic exacerbations are treated with topical creams, laser and oral therapies. Rosacea imposes a significant burden on quality of life (QoL). Recalcitrant rosacea for this study is defined as those patients who have suffered with rosacea for at least 10 years and have relapsed following treatment with at least one systemic therapy and one topical therapy. A Cochrane review (van Zuuren et al., 2015) selected 106 studies for analysis and showed no durable cure for rosacea. The longest follow-up of any study presented in this review was 40 weeks. No RT studies were included.

VMAT allows RT to be tailored to complex convex skin surfaces. Multifocal invasive cancers on the nose are especially amenable to this treatment (De Martin et al., 2018) without any tissue loss. The nose is also often involved in rosacea, and this can be incidentally included in VMAT treatment volumes for nasal skin cancers. A published retrospective case series of 4 patients (Fogarty et al., 2021) showed incidental long-term in-field control of recalcitrant rosacea at a median follow-up of 21 months following VMAT for nasal skin cancers. One case is shown in Figure 1. The durability of rosacea control was associated with target volumes receiving at least an average of 36.5 Gy in an average of 22.5 fractions, a relatively mild dose of RT. A prospective study is required to reproduce these promising observations and to show that VMAT caused the control of rosacea. The trial schema is shown in Figure 2.

The main risk of using RT is RT- related toxicity. Acute reactions are dry desquamation of skin, and patchy nasal mucositis if nasal mucosa is within the treatment volume. These repair within 2- 4 weeks of treatment completion. Late skin complications of fibrosis and telangiectasia are rare at the dose suggested, especially when hyperfractionated, as is planned in this study. RT is also associated with the rare possibility of radiation induced malignancy, which is approximately 1 in 1,000 cases treated every 10 years post RT (Fogarty and Shumack, 2018).

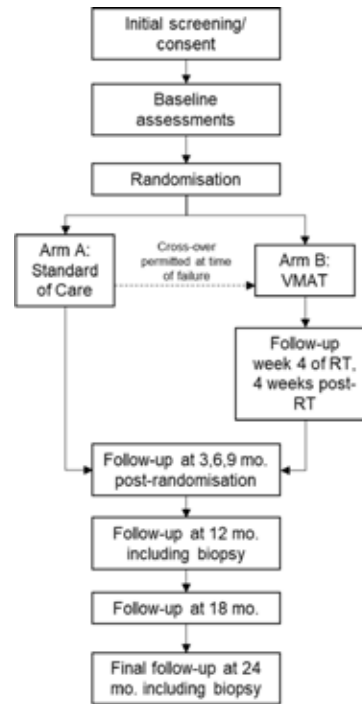
Inclusion criteria include patients 60 years and over who have recalcitrant rosacea. Only those with moderate to severe rosacea will be included, as this is the population most negatively affected by the disease. Forty patients are needed. Cross-over is allowed. Follow up is for 2 years. Referrers with five patients being randomised will get an authorship. The primary endpoint is the cumulative incidence of in-field failure within 12-months of randomisation. There are quality of life and economic end points. There is a translational sub study based on histopathology from three-millimetre punch biopsies taken pre and post treatment. These will hopefully shed light on the cause of rosacea and why VMAT appears to be a durable cure.

The study treatments are the following. The DSOC arm treatment will be chosen at the discretion of the treating physician. Options include only the following:

Figure 1: Anterior photos of the face of a person treated with VMAT for multifocal basal cell carcinomas (BCCs) of the nose with incidental recalcitrant rosacea. The first photo shows is at the RT planning stage, showing widespread recalcitrant rosacea of both cheeks and nose. The second photo shows a follow-up photo one year later showing complete cure of the BCCs but also durable in-field control of the rosacea at the dose line of 36Gy in 20 fractions which is shown as a dotted line. On the extreme right cheek there is still a small area of rosacea indicated by the black diagonal arrow. She requested this area to be treated by RT at this time!



Figure 2: ROSEND Study Schema



Professor Gerald Fogarty

Bsc MBBS FRANZCR PhD

Professor Gerald Fogarty is a Radiation Oncologist with a special interest in the treatment of skin disorders. He completed his undergraduate training at UNSW and specialty training at the Peter MacCallum Cancer Centre in Melbourne, followed by a lab based fellowship in skin cancer and a junior consultancy at Ballarat. Since then he has held positions of Director of Radiation Oncology at St Vincent's Hospital and Mater Hospitals, Sydney. He has over 180 publications and H-index of 29. He has helped discover several new applications for RT in including extended skin field cancerisation and the adaptive split course for locally advanced skin cancers in the elderly and some applications in benign disease. He was a board member of the Melanoma and Skin Cancer Trials Group (www.masc.org.au) for 9 years and Chair of the Australian Merkel Interest Group (<http://amigos.org.au/>). He authored the radiotherapy section of the 2019 NHMRC National Clinical Practice Guidelines for Keratinocyte Cancer. He consults and treat patients in Gosford, Wahroonga and Revesby. He is also the Master of Warrane College, an affiliated residential College at UNSW. (<http://warrane.unsw.edu.au>)

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1. Topical therapy – applied for a minimum of 16 weeks, and patients can remain on these treatments indefinitely during the study period.
 - Metronidazole (0.75%) gel or cream, applied once or twice daily
 - Ivermectin (1%) cream applied once daily
2. Vascular laser or Intense pulse light treatment – limited to 3 episodes of treatment, with a maximum of 4 weeks between each episode.
3. Oral antibiotic therapy – taken for a minimum of 8 weeks, and patients can remain on these treatments indefinitely within the study period.
 - Doxycycline (50-100 mg per day)
 - Minocycline (50-200 mg per day)

All three options can be applied at the treating physician's discretion.

The VMAT arm will deliver a total dose of 36 Gy in 20 once-daily fractions. There is a two week break between fraction 10 and 11 to decrease acute toxicity.

More can be learnt about the trial at the Australia and New Zealand Clinical Trials Register (ANZCTR) <https://www.australianclinicaltrials.gov.au/> with the ROSEND trial number being ACTRN 12622001585718. Prof Fogarty would be very happy to provide any other information and can be contacted on email: Gerald.Fogarty@icon.team.

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San Updates

Newly Accredited Specialists

Sydney Adventist Hospital has several newly accredited specialists, to find out more about them scan the QR code.



Upcoming GP Events

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New ANU study finds more advanced breast cancer since COVID-19

An increase in more cases of advanced breast cancer since before the pandemic has been linked to breast screening service shutdowns during COVID-19, a new study from The Australian National University (ANU) shows.

Researchers from the ANU Clinical School based at Sydney Adventist Hospital (the San) studied patients with breast cancer diagnosed between July 2019 and June 2022. The patients were categorised into pre-pandemic, pandemic and post-pandemic groups.

According to the study's findings, women faced two major challenges during the pandemic. First, many were frightened to attend general practitioner and hospital appointments for fear of catching COVID. Second, the national BreastScreen Australia program was closed during 2020 and 2021 for a total of six months.

Lead author, Professor John Boyages AM, from ICON Cancer Centre at Sydney Adventist Hospital (the San) spoke to Channel 9 Presenter Davina Smith about the study's findings.

Scan to watch the full segment.



Inguinal Robotic Hernia Repair Quality Project Milestone



The Inguinal Robotic Hernia Repair Quality Project at Sydney Adventist Hospital recently achieved a milestone with the completion of the 100th procedure.

It marks the halfway point of the project.

The Project commenced in late July 2023 at the San, with the aim of analysing data from up to 200 patients to assess the feasibility and cost-effectiveness of robotic-

assisted short stay hernia repair in a high-volume robotic surgery centre.

So far, early results from the first twelve months of the project have been positive.

"In the early phase of the project we have seen patients who undergo robotic hernia surgery have less pain, recovery quicker and able to return to work faster than with conventional open and laparoscopic

surgery," said Dr Walid Barto, former Head of General Surgery and Associated Subspecialties at Sydney Adventist Hospital.

Importantly, the costs to the patients for robotic hernia repair are the same as any other method of hernia repair. The San was the first hospital in Australia to implement a no-extra-cost model for robotic surgery for patients.

Further information about the project, including Frequently Asked Questions, is available by scanning the QR code.

