

The Home HANDYMAN

September/October 2018 • Vol 28 No 9



SA'S
ORIGINAL
DIY
MAGAZINE



DRIVEWAY GATES



BRAAIS

Secure your home

- Alarm systems
- Electric fencing
- Safes for valuables

+plus

Step-by-step:

- Paint a bathroom vanity
- Replace pool filter sand
- Make a motion sensor



RSA: R39.90 (VAT incl)
Other Countries:
R34.70 (Excl. tax)

Our plastic planet – why we need to recycle plastic waste

Driving through the river instead of taking the bridge?

Amarok can. Now with an 8-speed
automatic gearbox.



Volkswagen Amarok.
Greatest load capacity.

McCarthy Volkswagen Wonderboom

Cell: 083 488 8529, Tel: 012 567 9345



**Commercial
Vehicles**

CONTENTS

The Home Handyman is published bi-monthly (6 issues per annum) by WJ Lindeque cc t/a BB Print (CK99/23366/23)

Address: PO Box 24938 | Gezina | 0031 | RSA

Office: 065 849 3264

Fax: 086 234 5026

Email: editorial@homehandyman.co.za

Publisher Hannes Lindeque

Associate publisher Allan Swart: allan@homehandyman.co.za

Editor Gina Hartoog - editorial@homehandyman.co.za

Feature writers André Gous, Catherine Reimers, Cindy Le Roux, Gareth Greathead, Kim Roberts, Kin Le Roux, Reuben Hart and Tobias Lochner

Sub-editor John Badenhorst

Technical consultant Denis Lock

ADVERTISING REPRESENTATIVES

Wilma Lindeque 065 849 3264

Email: advertise@homehandyman.co.za

Yvonne Botha 082 563 6685

Email: yvonnebotha@homehandyman.co.za

Ruth Schultz 083 583 5243

Email: ruth@homehandyman.co.za

Bernard Snyman 072-190-2824

Email: bernard@homehandyman.co.za

HOW TO SUBSCRIBE

Email: subs@homehandyman.co.za

Fax: 086 234 5052

Digital subscriptions www.mysubs.co.za

Online www.homehandyman.co.za

Layout & design dee@stormdeezigns.co.za

Printing House of Print | 011 474 8750

Distribution Republican News Agency | 011 248 3536

About *The Home Handyman* magazine:

The Home Handyman magazine is a specialized D.I.Y. publication and caters for a well-defined niche market since November 1993. The magazine equips its ever-growing readership with relevant D.I.Y. information, knowledge and skills.

The views expressed in this publication are not necessarily those of the publisher or its agents. While every effort is made to ensure the accuracy of the contents of this magazine, neither the editor nor the publisher can be held responsible for any omissions or errors. Images used are for illustration purposes and are not endorsed by *The Home Handyman*. Every care has been taken to ensure that all the information and projects presented in this publication are accurate, reliable and safe. It should be noted, however, that the ideas for design and product use are presented as suggestions only! The editor strongly advises that the reader check local by-laws and consult a qualified professional before undertaking any project and cannot be held responsible for any loss, damage, injury or death resulting from any information contained here.

Copyright: *The Home Handyman*, 1994. Copyright is expressly reserved and no part of this magazine may be reproduced or transmitted, in part or whole, in any form or by any means, electronic or mechanical, including photocopying, recording or any information storage or retrieval system without prior permission of the publisher. All enquiries regarding editorial correspondence, manuscripts and photographs should be directed to the editor.



www.facebook.com/TheHomeHandymanmagazine



@TheHomeHandymanmag



https://za.pinterest.com/homehandyman/

FEATURES

12 Secure your home

Find your home's weak spots

18 Electric fences

Know the legislation

20 Safes

Choose the right safe for valuables

22 Metalworking

André Gous redesigns a driveway gate

25 Windows

Remove and replace a broken window pane

26 Outdoor

The right braai for your lifestyle

30 Environmental

Kim Roberts reports on plastic recycling

32 Solutions

Q & A on plumbing and water problems

35 Gardening

Care for your gardening tools

36 Swimming pools

How to change your pool filter sand

39 Maintenance

Spring-clean your garage

40 Painting

Catherine Reimers glazes a bathroom vanity

44 Electronics

Kin Le Roux makes a motion sensor

48 Personality

Meet woodworker Ronnie Searle

50 Young DIY'er

Cindy Le Roux makes the *Googly-eye Toothbrush Robot*



36

REGULARS

6 Off the shelf

All the latest products for the DIY'er

8 Voice your views

Your chance to air an opinion

10 DIY matters

News, views and reviews from around the globe

43 Bright ideas

Readers share their innovative time-and-space saving DIY ideas

52 Ask our experts

Your DIY queries answered by our panel of experts

54 A Woodworker's diary

Denis Lock continues his discussion on mouldings

58 Woodworker's corner

Choose the right workbench

61 Showcase

Woodworkers showcase their projects

64 Tailpiece

Reuben 'The Screwman' Hart loses his car keys



39



40



50

Competitions & giveaways

8 **Win** a Makita MT M9203B Finishing Sander

11 **Win** double tickets to the *Pretoria Homemakers Expo*

43 **Win** a Tork Craft Mini Rotary Tool from Vermont Sales

52 **Win** product gift hampers from A.Shak

The Home HANDYMAN

www.homehandyman.co.za

2018 SUBSCRIPTION FORM

Subscription Fees:

South Africa	Printed	Digital
Back Copy	R31.90	R27.95
6 issues	R190.00	R159.00

Neighbouring countries: R505.00 for 6 issues

Overseas by Air Mail: R594.00 for 6 issues

Subscription fees are valid until 31 December 2018

Subscriber's details:

I would like to receive a printed/digital copy.
(Please indicate)

Start subscription with the issue?

Name:

Email:

Postal Address:

Postal Code: Tel:

Gift subscription from:

Tel: Email:

Direct Deposit / EFT Payments:

EFT - (Electronic Fund Transfer) directly to our account:

ABSA Bank

Branch Code: 632 005

Cheque account: **BB Print** 404 881 8651

Reference: "Sub + HH + surname"
(example SubHH-Lindeque)

Fax/Email proof of payment plus this completed
subscription form to 086 234 5052.

**Please Note: There is an additional deposit fee of R39 if
payment is made in CASH.**

Contact us:

Email: subs@homehandyman.co.za

BB Print | PO Box 24938 | Gezina | 0031 | Fax: 086 234 5052



FROM THE WORKBENCH

Put a plan in place

Welcome to another issue of
The Home Handyman.

In our previous issue, a reader had a question about the importance of sealing one's wooden deck over the dry season, and in our case up here in Gauteng, the winter season. After reading the response from our expert, I roped in my hubby, Bram, and we decided that the deck off our patio should be properly sanded and resealed.

Needless to say, we started the job... at a snail's pace. First one half of the deck was sanded, then another section...with a few busy weeks between. We got to the stairs... and side panels. The weeks past and things did not move ahead. Everything else seemed to take first priority. Finally, I realised just how important it was to get this job done – not only are seasonal winds upon us but the rain is just around the corner...

When it comes to renovation around the home, we jump in boots and all. The anticipation of the 'new look' is an important motivating factor. Maintenance jobs are often the grunt work of DIY – and we sometimes lack the proper inspiration to complete them.

As I noted with our deck job, proper planning is so important – whatever the project or task. *Failure to plan is a plan to fail*; it's an old saying but very meaningful, especially when it comes to DIY. Had we planned properly, considered our timeline and went ahead with the maintenance, our deck could have been completed in one weekend. Instead it became a source of irritation over an extended period.

With yearend maintenance looming, we want to make the task a bit more colourful for you. We have a poll on our website – www.homehandyman.co.za – on which tasks you plan to tackle as the year draws to a close. Pop along and vote and we'll see how we can help in the next issue.

Speaking of proper planning, security is one area where we need to think ahead and be proactive. Consider your home's weak spots and find the right solutions for them. If you have an electric fence, don't miss the article on page 18. The legislation is clear and you can be held liable.

We have a number of projects in this issue. André Gous takes an ordinary driveway gate and redesigns it with wood panels for a stunning look. We also introduce some new contributors in this issue. Catherine Reimers shows you how to mix and use glaze to transform a bathroom vanity and Kin Le Roux, our new fundi on the electronics side, shows you how to build a motion sensor. Kin's wife, Cindy, tackles our *Young DIY'er* project.

As you celebrate Heritage Day on September 24th, perhaps around the braai fire with friends and family, consider your impact on our planet. What heritage are you leaving your children and grandchildren? We all need to do our bit when it comes to recycling our waste. Let's plan to live more sustainably – and execute it too!

Take care,

Gina





Simple Solid Power



STANDARD DUTY INDUSTRIAL POWER TOOLS



For more info. or your nearest MT Dealer contact Rutherford:
• JHB: 011 878-2600 • CT: 021 932-0568 • DBN: 031 717-6400

www.makita.co.za

OFF THE SHELF

Your guide to the latest products in the world of DIY

Lightweight trimmer

Makita's MT3700B Trimmer will benefit those who do a lot of woodworking projects that require an easy and effective way to accomplish small routing tasks as this versatile tool can be operated using only one hand. The transparent plastic base increases visibility of the area you are working on and it is lightweight as well as highly manoeuvrable. Makita's MT range of Standard Duty Industrial Power Tools provides the quality you expect from Makita at an affordable price.

Specifications:

- A 530W motor.
- A standard collect of 6.35mm, so that standard router bits (purchased separately) will fit this model, providing you with variety
- Plunge capacity of 0 - 42mm
- No load speed: 35 000rpm
- Supplied with a 2m power cord

For more information:
Visit www.makita.co.za or
call 011-878-2600



Compact DIY drill/driver

The Bosch EasyDrill 12 weighs in at only 900 grams, making it lightweight and comfortable to use, even for long periods of time. This drill/driver is easy to operate and features a quick-release chuck for easy changing of accessories. The tool offers a simple yet powerful solution for many screwing and drilling applications. There are no special default settings required for torque or speed. A three-stage LED display keeps the user informed of the current battery charging level at all times.

Specifications:

- Maximum battery power/capacity: 12V/1.5Ah
- No-load speed: 0 - 700rpm
- Maximum torque (hard/soft): 15/6Nm
- Maximum screw diameter: 6mm
- Maximum drilling diameter in wood/steel: 16/6mm
- Chuck: auto-lock
- Charging time: 180 minutes
- Dimensions: 155 x 75 x 190mm

For more information:
Visit www.bosch.co.za or
call 011-651-9729



Save backwash water

The swimming pool filter backwash process wastes a lot of water and it costs money to fill up the pool up again. This is where the Speck Pumps WaterWise Backwash Tanks can help you save water and save money. Instead of allowing backwashing water to go down the drain, connect your backwash waste-line to the inlet connection on the top of the tank and connect a return pipe to the fitted valve at the bottom of the tank to your pool. Water can now be pumped into the tank. After the backwash process, treat the water with a bit of chlorine and a flocculent (available at your nearest pool shop) and let the water settle for a day. The water can then be 'pumped' back into the pool via gravity feed by opening the fitted valve at the bottom of the tank! Various sizes and fittings are available.

For more information:
Visit www.speck-pumps.co.za
or call 011-455-4300 (Jhb)
or 021-704-1143 (CT)



Bevel edge chisels

Narex produces innovative premium chisels with an improved cross-section of the blade that minimises friction when cutting into wood. Improved grinding of the edges creates especially thin sides which are particularly needed in dovetailing and cabinetmaking. The ergonomic handles are made from hard and hefty hornbeam wood and are strong enough to withstand heavy mallet blows. The combination of the stained hornbeam handle, brass ferrule and improved grinding of the blade create a well-priced quality tool. Narex Bevel Edge Chisels are produced in the Czech Republic.

For more information:
Visit www.toolcraft.co.za or
call 021-705-1247



Bright paint for crafters

Chalk painting is fun and its creative possibilities are endless. Start planning your next chalk paint project with spring around the corner and give your garden pots a new bright make-over. Granny B's Old Fashioned Paint is a family-owned and operated business, established in mid-2015, and has grown to become a leading locally founded chalk-finish paint product brand in South Africa. The company has over 200 stockists across Southern Arica and now services the South African, Namibian, Zimbabwean and Zambian markets – with ever growing interest from countries as far as Australia. Visit the website for a map of stockists or shop online and to have your order delivered to your front door.

For more information
Visit: www.grannyb.co.za or call:
011-708-0139



No more throbbing thumbs

The Perma Power Punch Picture Nail Applicator is a must-have for any DIY enthusiast. This simple tool makes it easy to hammer picture nails into walls and minimises the risk of damaging the wall plaster and your fingers in the process.

The Perma Power Punch Picture Nail Applicator has been designed with an extended safety handle to reduce the risk of injuries. Say 'goodbye' to those throbbing thumbs and 'hello' to the beautiful pictures that you've been wanting to put up for the past six months!

The Perma Power Punch Picture Nail Applicator comes standard with twelve Picture Nails. Additional Pictures Nails are available in three different sizes and can be conveniently stored inside the handle of this tool. Available at most hardware and retail stores nationwide.

For more information:
Visit www.permaproducts.co.za
or call 021-555-7400



Primers for tiling

To make DIY tiling easier and more cost-effective, TAL now supplies a handy 5kg bag of their powder primer, TAL Keymix. Mixed in a 2:1 volume ratio with TAL Keycoat, the 5kg bag will produce a primer slurry coat that will cover approximately 8.5 to 10m², enough for a small bedroom, or a bathroom. Use this priming system when tiling onto smooth dense surfaces or if tiling over existing tiles. Add the powder to the liquid to ensures better dispersion and prevents lumps from forming. To apply, paint the slurry coat onto the surface, or existing tiles with a block brush to enhance the bond of the adhesive onto the surface.

TAL Keymix and TAL Keycoat is available from tiling retailers and selected hardware stores nationwide. Visit the website for step-by-step guides, useful how to information on different tiling projects and tools for the DIY enthusiast.

For more information:
Visit www.tal.co.za or
call the TAL Technical Advice Line
on 0860-000-TAL (825)



See your product in this space!



The Home HANDYMAN
www.homehandyman.co.za

To advertise in
The Home Handyman's
Off the Shelf,
please contact Wilma
on 065 849 3264 or
email:
advertise@homehandy.co.za

VOICE YOUR VIEWS

Do you have any thoughts or comments on DIY issues?

WIN

Share your opinion

The Home HANDYMAN

www.homehandyman.co.za

Send us your views, ideas and opinions and you could win a Makita MT M9203B Finishing Sander.



Send your queries to:
editorial@homehandyman.co.za or
P.O. Box 24938, Gezina, 0031

Please include your name, physical address and contact number (office hours)

Hennie Ackermann

wins a 6-issue subscription to *The Home Handyman* magazine.

Prizes are not exchangeable

Calling all woodworkers

I am quite excited about the revival of a delightful magazine that I have been a part of since 1998 or so. I have placed some of my woodwork projects and personal profile of my woodworking involvement in the magazine when it was still going with Warren, Johan and Gareth. I will send some more of my projects soon. I am a member of the Pretoria Woodworkers' Association. My main field is cabinet

making, restoration and repairs to furniture. I wish you well with the magazine and as always will promote it to friends and family.

Hennie Ackermann, by email
(Thank you, Hennie. We look forward to receiving your projects and sharing them with our readers. We are very keen to liaise with woodworkers' associations throughout South Africa so please do put us in touch. - Ed.)



Celebrating a rebirth

I have been a reader and subscriber of this magazine for many years. However, I now want to congratulate Hannes and Wilma and their team's decision to re-launch this wonderful magazine. Since the discontinuance of *The Home Handyman* I have been looking for a replacement, but there

was really nothing to compare it with. Yes, there are a lot of glitzy magazines on the market, but the content did not really interest me. I wish you a long and very successful rebirth!

James van Heerden, by email
(Great news, James. Thank you for your support. - Ed.)

WINNING LETTER

On our Facebook page

All three of the new issues have been great. The same high quality magazine as it always has been. It's as if *The Home Handyman* never had a break in publication. Great job to all. Thank you and keep it up.

Dave Whittington



How can we help?

Tablesaw

Johan Human of Macleantown asks: "I purchased a Toolmate tablesaw (Model TSO 10L) from a deceased estate. Unfortunately the rail and guide did not come with it. Where can I get one?"

Dennis Lock suggested a company in Port Elizabeth. **John Miller** of Strand Hardware in PE responds: "We do have a generic fence and rail set available that will fit most table saws."

Adhesives

Terril Scott writes: "I have been tearing my hair out trying to find a reliable source for West System (TM) epoxy products in South Africa without result. Your July/August issue showcased a banjo project in which the author mentioned West epoxy. Do you know where I can find it?"

Etienne Claassen replies: "I get my West epoxy from the USA, but I have seen it at Builders Warehouse in Cape Town. Perhaps they can order it."

If you have a small query, email us at editorial@homehandyman.co.za and we'll network to assist you.

Good reviews

I recently retired and I am keeping myself busy with my lifetime hobby of carpentry. The July/August edition of *The Home Handyman* is the first ever copy I bought. I buy various other DIY magazines and can honestly say that I was most pleasantly surprised by the quality of the overall content of *The Home Handyman*. I will be buying it on a regular basis from now on. Keep up the good work.

Rei Engels, by email.

(Thank you, Rei. Please share some of your carpentry projects with us. We'd love to see them.- Ed).



Reader's projects



The Home HANDYMAN
www.homehandyman.co.za

Willing to share your latest project with our readers? Send a step-by-step write up of how to make the project, along with step-by-step photographs (at least 300kb) and a picture of the finished product.

Email projects and photographs to:

editorial@homehandyman.co.za





Book chests for charity

A team from Vermont Sales joined seventy five Massmart staff members for a joint charity drive for Hope Worldwide SA and Mandela Day. The aim of the drive was to build as many book chests as they could in a limited period. Vermont Sales brought in their latest innovative power tools, equipment and work centres along with their experienced staff to assist and help the Massmart team with the project.

The project was a pine constructed box assembled using the Kreg pocket hole joining system. This allowed for the project to be completed from start to finish within an hour. Festool dustless sanding made a first-time experience, for many with power tools, a simple and compelling encounter.

"The project was so successful that we built, decorated and packed nineteen book chests with the assistance of

Massmart team members and the amazing Vermont Sales guys," said Laura Persse, social sustainability specialist at Massmart. "Hope Worldwide SA, the beneficiaries, were there on the day to assist with the decoration and packing of the chests and they were impressed by the thoughtfulness of the project and the skill with which the Vermont Sales guys managed to get a team of novices to produce first class book chests."

The book chests will be distributed to ten Hope Worldwide SA early childhood development centres in Diepsloot.

Greg de Villiers of Vermont Sales thanked all participants on behalf of his team.

"Our day is so much better when we get to share the experience of working with the best tools on the market and when this benefits people in our community, this is so special. It was a huge success and certainly from our side a lot of fun."

For more information contact:
Vermont Sales on 011-314-7711
or visit their web site
www.vermontsales.co.za

5th Anniversary for Timber Festival

The *Knysna Timber Festival* will celebrate its fifth anniversary in October, as a showcase of local excellence across the value chain in the town where South Africa's timber industry first took root. The Timber Festival presented by the Knysna Timber Initiative (KTI) – a trade body of local industry leaders who represent every segment of the timber and woodworking value chain.

The *Knysna Timber Festival* is an end-to-end showcase of local timber and woodworking materials, machinery, manufacturers, products, services, skills and industry innovations. The Festival connects suppliers to buyers and promotes unity and collaboration across the industry.

The exhibitors at this year's festival have been drawn from a broad spectrum of the timber economy, including furniture manufacturers, timber growers, wood millers, timber merchants, members of the timber construction industry as well as woodturnings showing their skills and tools used in their craft. Outdoor exhibitions and demonstrations areas will provide spaces for conversations, talks, presentations, and films about wood and working with wood.

There are activities on offer, from an exciting entertainment area featuring live music, a beer tent, and children's play space, designed with families in mind.

Show details:

Exhibition dates:

5 - 7 October 2018

Venue:

Timber Village, Welbedacht Lane, Welbedacht

Times:

Fri - Sat: 9am – 5pm. Sun: 9am-3pm

Entrance:

R20

Enquires:

Picca de Bruin; cell: 082-571-2462;
info@timberfestival.co.za;
www.timberfestival.co.za



New venue for Pretoria Homemakers Expo

The 2018 Pretoria Homemakers Expo relaunches as the first show of its kind at the brand new Sun Arena, Time Square in the heart of Pretoria East. This state-of-the-art venue promises to ensure an excellent experience for visitors. Show patrons can explore, consider and purchase items needed

for home and garden projects. Along with practical products, a number of knowledgeable experts are on hand to help with home research and unanswered questions. You can also enjoy the entertainment and music on offer or food and beverage at the d'VINE life food market.

Show details:

Date:

28 - 30 September 2018

Venue:

Sun Arena, Time Square, 209
Aramist Avenue, Menlyn, Pretoria

Times:

Fri 10am – 7pm; Sat 9am – 7pm
and Sun 9am – 6pm

Entrance:

Adults R80, Pensioners R50,
Scholars R20, Children under 6 -
free.

Information:

086-111-4663 or e-mail expo@
homemakers-sa.co.za

WIN DOUBLE TICKETS

15 lucky *The Home Handyman* readers can win double tickets to the Pretoria Homemakers Expo on 28 to 30 September 2018.

To enter, email your name, surname, address and contact telephone numbers to editorial@homehandyman.co.za. Please include 'PTA Homemakers Expo Tickets' in the subject line.

E-tickets will be emailed to the winners. You will need to print them out and present them for entry at the show. Transport costs to Pretoria are not included in the prize. Entries close 25 September 2018.



Power tool brand launched in SA

Upat SA (Pty) Ltd has introduced a new power tool brand to the South African market in the form of AEG Powertools. The launch range includes grinders, drills (masonry and steel), planers, saws, sanders and some accessories. Corded power tools will be introduced initially, to be followed by tools using advanced cordless technology in accordance with market requirements.

This is the first time that Upat has a dedicated power tool brand for the retail and reseller markets. "We identified a gap in the market for a high-quality, simple-to-use, and cost-effective power-tool brand," said Upat retail sales manager Jaco Jansen.

The company aims to focus on aftermarket service and training to ensure customers receive a high level of support. "Our sales staff have received in-depth training from AEG Powertools in order to be able to provide customers with market-leading support throughout the lifespan of the tools," said Jansen.

Upat has established a dedicated AEG Powertools service centre, in addition to a comprehensive spares' holding to ensure rapid and efficient servicing. AEG Powertools come standard with a one-year warranty, which can be extended by an additional year free-of-charge if the consumer registers on www.aeg-powertools.eu within thirty days from the date of purchase.

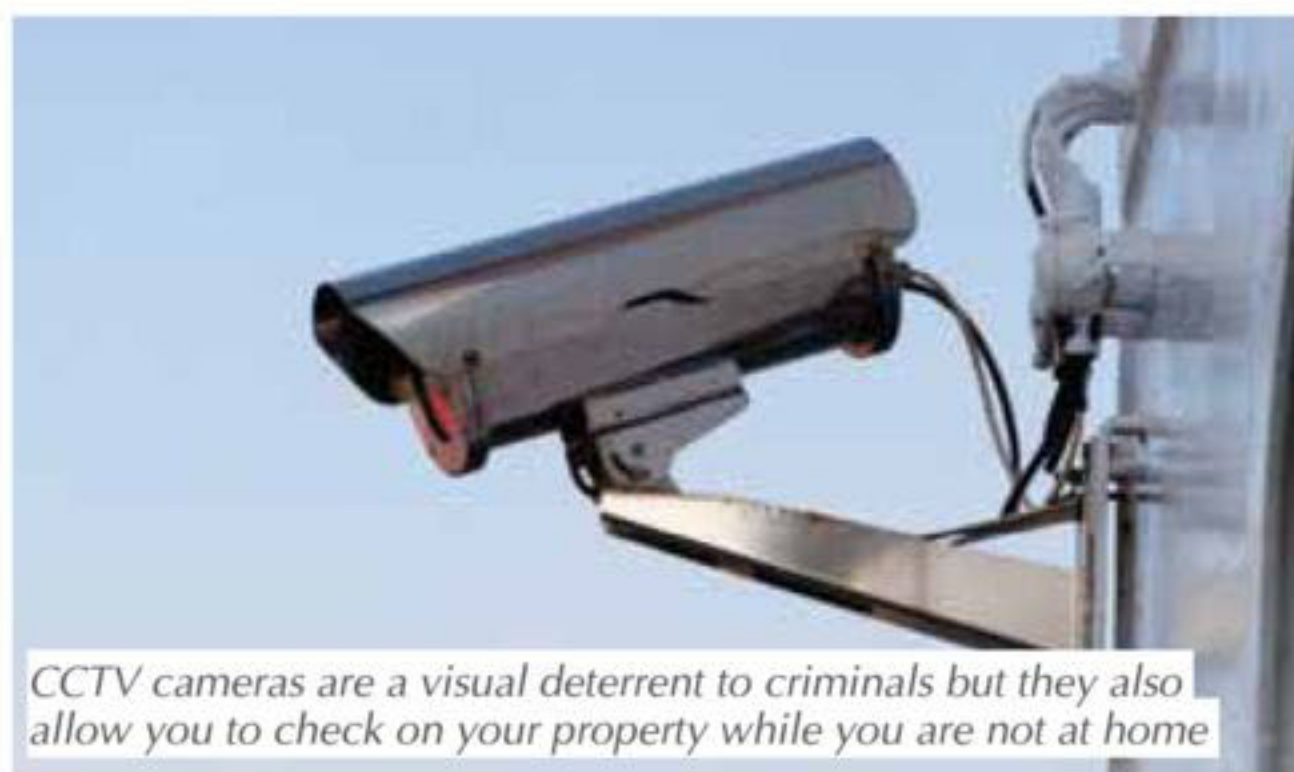
For more information about AEG Powertools visit: www.upat.co.za



Security fixtures are designed to discourage criminals from entering your property – but if they do get in, a good detection system provides an early warning and external support

>> Gareth Greathead

Closed-circuit television (CCTV)



CCTV cameras are a visual deterrent to criminals but they also allow you to check on your property while you are not at home

There are a range of plug-and-play CCTV systems which make installation simple for the DIY enthusiast. Many come with cameras that are suitable for either indoor or outdoor use, day or night and other circumstances. Modern residential CCTV systems also use GSM technology which allows the homeowner to dial into a camera from their cell phone when not at home.

Tips for installing a CCTV system

1. Ensure that the correct cameras are used based on indoor versus outdoor use and take into consideration any additional environmental factors.
2. Position cameras so that they do not face into direct sunlight or bright surfaces. This includes the light reflecting off a swimming pool.
3. The quality of the wiring may affect the quality of the final picture – joins should be soldered and well insulated.
4. It is vital that the correct power supply is selected based on the number of cameras and the distance of the cameras from the power source. Use a regulated power supply to ensure consistent quality of picture.
5. Avoid running the cables alongside power cables, as this will interfere with your CCTV image.

Lighting outdoors

Lighting is a cheap and effective deterrent, although energy consumption should be taken into account.

Motion sensor lights use infrared (IR) technology to pick up movement in the area it covers. This saves power but also has the power to surprise a thief who may be 'caught in the act', or at least, 'in the headlights'. Common places to install lighting include above doors, overlooking parking bays and on the upper portion of a wall underneath an eave or near the peak of the roof.

LED – light emitting diodes offer enormous energy saving potential. For example: a 60W incandescent light bulb produces approximately 850 lumen of light while the same measure of light can be obtained with a 10W LED. Additional benefits of LED lights over older technology include zero 'warm up' time as opposed to a delay experienced with compact florescent light (CFL). Also, the lifespan of LEDs, measured in hours of operation, is often superior and is not adversely affected by turning it on and off or overheating.

Motion-sensor floodlight



TIP! Connect floodlights with motion sensors to a 12V buzzer inside the home informing those inside of movement in the area.

Solar LED floodlights equipped with a motion sensor have the lowered power consumption to such a degree that its power needs can be satisfied with a small integrated solar system. The system collects energy from the sun using its solar panel during the day and stores the power in batteries which can be used later on. Besides the fact that they use no power at all, solar powered floodlights are ideal for DIY because they do not require the pulling of electric cables.

Are your security measures in working order?

- Ensure that gates and gate motors are fitted correctly and fully functional
- Check that floodlights are working and in the best location
- Regularly test your alarm system and make sure that it is set up correctly for 'Full/Away' and 'Home/Stay' arming
- Make sure that fixed and mobile panic buttons are all in working order



Driveway entrances

Bushy plant growth on the pavement, especially near entrance gates, gives criminals the perfect hiding place! Check your driveway and the areas directly next to your gate. Keep trees trimmed back and remove large shrubs. If you want to beautify your pavement, choose low-growing plants and groundcover.



Motion detectors installed outdoors should blend in with the environment

Wheelie bin warning

Security company Fidelity ADT cautions residents not to put wheelie bins on the pavement the night before collection. General manager Agnieska Gryn says putting your dustbin out the night before means that it sits on the pavement overnight and can be used as a perfect stepladder to get up into a tree and over your wall.

Bins left out overnight are also being used as a hijack lure. Criminals turn the bin over in the middle of the driveway. If the homeowner arrives home late

at night or in the early hours of the morning, he or she is now forced to exit the vehicle to move it - only to find themselves in a hijack situation.

"If you are not going to return home at the end of a collection day, ask a neighbour to take your dustbin in," said Agnieska. "A dustbin left standing on the pavement is a dead giveaway that there is nobody home. Never put anything in your dustbin that has all your details on it. Always shred confidential information."



Effective home security is all about creating layers of defence. Your first line of defence is at your perimeter wall and deterrents like high walls and spiked fences are a good start. Better yet, is an electric fence which is more difficult to scale as tampering will sound an alarm, buying you time to react and summon help. Even if you have an electric fence it should be supported with physical barriers like security gates and internal and external security devices like motion sensors and CCTV cameras.

Identifying weak spots

Have you ever been locked out of your home? Did you wait for someone to assist or did you opt to break in? If you got in, chances are good you knew exactly where to look for 'weak spots'. If you could find them criminals will probably find them too. Before choosing a property to break into, criminals will survey an area and look for homes that are an easy target, or 'easier' than other homes in the area.

Gates and walls

A gate that is incorrectly installed, or one without an anti-lift bracket can be lifted off its tracks and pushed aside. On the inside, an anti-theft bracket can be installed, securing the motor in place making it more difficult to remove. When it comes to swing gates, hinges should be fitted on the side and welded

so they cannot be removed. If your gate or wall has holes in it, these may be used as a step ladder. Consider closing these with vertical bars or some other obstruction.

Security gates

Security gate locks should always be five lever locks or cylinder locks with keys that need to be cut by a locksmith. Double security gates (those with a left and right gate) are only effective if installed and used correctly. If the gate is only secured at one point at the centre, with no means of holding the gate in position at the top or base of the gate,

this leaves the gate vulnerable to being wedged open.

Sliding doors

Sliding doors alone are not secure and can be unlocked from the outside using a flat screwdriver or lifted up and off its tracks. To prevent lifting, you need to keep the door rollers in good condition and properly adjusted. You can also install anti-lift devices such as a pin that extends through both the sliding and fixed portion of the door. There are also numerous locking and blocking devices available in hardware stores that will prevent a sliding door from being lifted or pried open.



Wireless technology eliminates the need for unsightly wiring

Windows and other doors

Slam plates and hinges on solid wood doors are your weakest point and can be easily upgraded DIY. If you have good quality slam plates, simply drill holes for longer and thicker screws to prevent them pulling out should someone try to kick the door open. Door hinges should always be on the inside and designed so that hinge pin cannot be removed from the outside. Make sure your window adjustment locks are properly maintained and check that the windows cannot be forced open from the outside. Again various window latches, locks and security devices are available from retail outlets.

Burglar bars

These are a feature on most South African homes and the anchoring points for these are of utmost importance. In many cases rawlbolts are used to fix exterior burglar bars due to the inherent strength of these fasteners. This is of little help if the bolt heads are left exposed and can be removed with a common ratchet. To solve this, make sure the bolts are tight and spot weld or slightly grind the bolt head making the bars more difficult to remove.

Ideally, interior burglar bars should be welded to the frame of a metal window, but pop rivets are sometimes used due to convenience. In addition, many DIY type bars are only secured from the sides making these easy to leverage away. The additional vertical bars on the top and bottom increases the number of anchor points and increases rigidity significantly.

Protecting weak spots

Now that you have had a look at your property from a new perspective and strengthened some areas, weak spots may still remain. One way of defending these is with the installation of infrared (IR) motion sensors in and around the boundary of your home. Driveways, doors, big windows, sliding doors and even your roof can be monitored by sensors.

Wireless technology

Wireless alarm systems are affordable, easy to install and can be upgraded and accessories added when required. With most products, only the control panel

need be plugged into a power supply and all accessories are battery operated and 100% wireless. Accessories are 'paired' with the system at the touch of a button and can be added when required.



Beware of openings in your walls or horizontal bars in fences that may be used like a step ladder to get over

Even if you have an electric fence it should be supported with physical barriers like security gates and internal and external security devices like motion sensors and CCTV cameras



Wireless accessories include motion sensors, door and window contacts, remote controls, panic buttons, additional keypads for bedrooms and even smoke detectors. Most wireless systems use Global System for Mobile Communications (GSM) or cellular phone technology and use a SIM card which will send a message to a list of pre-programmed telephone numbers, which can include your alarm company, when tripped.

Passive infrared sensors (PIRs) do not emit any energy but are triggered by heat radiating from objects within its field of view. These sensors detect infrared energy by means of a photo detector and monitor the environment for any changes in temperature. Humans emit about 9 to 10 micron of infrared energy. Any emission within this range is detected and relayed to a control panel and a siren is activated or a signal is sent to an outside security company.

Active infrared sensors (AIRs) work in unison with one being a transmitter of an IR ray and the other a receiver. In other words, the transmitter creates an invisible beam between it and the

receiver on the other end when on. If something obscures the beam between the two sensors it will trigger the alarm. These sensors are ideal when protecting parking areas, front or back yards or even larger areas inside your home.

Both of these PIR and AIR can benefit from having more than one lens which means multiple beams. This feature limits the potential of false trips because it will only trigger when two or more beams are triggered. This means your pet may get in the way of one beam but is not high enough to trip the other. On the other hand if a person walks in front of the sensor more than one beam will be broken and so triggering the alarm.

Dual technology (DT) sensors combine a PIR sensor with microwave technology. The designers considered this because PIR sensors can be sensitive to changes in the environment, like temperature variations and affected by wind and movement of leaves and other inanimate objects. With DT both the PIR and the microwave circuit will have to detect movement before the alarm triggers, further narrowing the chance of a false alarm. ■



Active infrared sensors send out an invisible beam between its two lenses and sound the alarm if the line is interrupted



BOSCH
Invented for life



EasyDrill 12 Cordless Drill Driver The most handy and user-friendly cordless drill driver in its category

With the Bosch EasyDrill 12 do-it-yourselfers receive a particularly handy cordless drill / driver, with which screwdriving and drilling projects in the home and garden can be done in no time at all. The keyless chuck for quick bit and drill changes, the ergonomic design and the low weight ensure comfortable operation. Thanks to the lithium-ion battery, the device is always ready for use, because self-discharge and memory effect are a thing of the past.



AdvancedImpact 18 QuickSnap Impact Drill The all-round solution for screwdriving and drilling.

With the AdvancedImpact 18 and three matching adapters Bosch offers for the first time a cordless combi drill system for DIYers. Its field of application ranges from conventional screwdriving to drilling into wood and metal as well as impact drilling into masonry – and the QuickSnap adapters make the tool even more versatile. If they wish, DIYers can combine the AdvancedImpact 18 QuickSnap with a drill chuck, an eccentric or an angle screw adapter, allowing them to work precisely even in hard-to-reach areas.



AdvancedVac 20 Vacuum Cleaner Wet and dry vacuum cleaner with blowing function and automatic on/off function.

The AdvancedVac 20 vacuum cleaner is a high-performance universal vacuum cleaner with blowing function, and is suitable for wet and dry cleaning. The AdvancedVac 20 has a universal adapter that provides direct dust extraction when working with any Bosch Home & Garden power tools, and has a practical compartment for cable and equipment.



BoschDIYSouthernAfrica



@BoschDIY_SA

www.bosch-pt.com

MyBosch

3 year warranty

Welcome to MyBosch
Your world for home & garden

Get three instead of one year warranty on your DIY power, garden and measuring tools from Bosch. Visit www.mybosch-tools.com to register

SYNEON
Chip

Intelligently controlled energy for every project.

The Syneon Chip intelligently controls energy according to demand. For perfect performance and endurance throughout the entire project.

Electric fencing provides a physical barrier to keep burglars out – with the potential to cause an unpleasant shock should they decide to breach the barrier

Keep it legal

Electric fencing provides excellent perimeter security but must be installed and maintained according to legislation

>> Gina Hartoog

Security experts divide residential security into three areas – the perimeter, access points and detection of intruders. Perimeter security provides a first barrier that should deter criminals from trying to gain entry into your property. Should this fail, your home's access points need to be covered and finally, if they are able to get inside, an alarm system should alert a security company of the intrusion.

In South Africa, electric fencing is a popular security solution for perimeter security. Electric fencing provides a physical barrier to keep burglars out – with the potential to cause an unpleasant shock should they decide to breach the barrier.

An important consideration about electric fences (whether you have a fence or are considering installing one) is that it complies in terms of the law. In these important regulations, the term 'electric fence' refers to an

“electrified barrier consisting of one or more bare conductors erected against the trespass of persons or animals”.

Old electric fences (those installed before 1 October 2012) do not need to be replaced if they comply with previous legislation, but an Electric Fence Certificate of Compliance (EFC) must be issued if the fence is changed or replaced.

What the law says

Operations Director, Mark Palmer, of the Electrical Approved Inspection Authority Southern Africa (EAIASA) says that electric fences are governed by the provisions of the Electrical Machinery Regulations 2011. “In these regulations any person may install an electric fence system providing that it complies with the provisions of the incorporated South African National Standard 10222-3,” explains Mark. “A person who is registered by the Department of Labour as an Electric Fence System Installer must test and inspect the fence to ensure compliance and subsequent to the inspection and test, issue a valid Certificate of Compliance for the fence.”

What should the homeowner be aware of?

1. Electric fencing may be installed on any wall

Electric fencing can be installed on any type of wall – brick, prefabricated concrete or palisade. The wall must be structurally sound, with a minimum height of 1.5 metres. Fence brackets must be angled at no more than 45°, installed on the inside of the wall. If you need to angle brackets towards your neighbour's property, you'll need their consent. You may not electrify barbed wire. "Caution must also be taken when looking at the proximity or location of neighbouring electric fences," says Mark.



2. You can install your own fence

Mark says that a DIY homeowner can install the brackets and wiring for an electric fence, but the fence must be connected by an approved installer who will issue an EFC. As noted above, installers must pass a stringent examination with the Department of Labour before they are registered.

3. You need to display 'danger' signs along the fence



Fences installed along pathways or public roads must be properly identified with yellow warning signs measuring 10 x 20cm in size and placed at regular intervals. These must also be displayed at gates and other access points.

4. If you sell your home, you need an EFC

If your fence was installed after 1 October 2012 and you are selling your home, you need to obtain a valid Certificate of Compliance for the entire electric fence system.

5. The top of a gate may be electrified

Electric fencing can be installed on top of gates, but it must be done correctly to ensure that those operating the gate can do so without receiving a shock.



6. Earth spikes are required

A minimum of three earth spikes are required, and must be installed every thirty metres. Earth loops should also be placed between three wires to detect separation. The maximum voltage allowed by law is 10,000 volts, with around 7,000 volts a common average.

7. Maintain vegetation on your fence line

Plants and vegetation that touch the wiring can cause energy leaks and arching. These should be trimmed back regularly.



8. In the event of injury or death, you may be held accountable

You have a duty to install and operate your fence in a way that it does not cause hazard or entanglement of people or animals. Because the current is intermittent, the electricity flowing through the fencing wiring turns on and off with each pulse. A faulty transformer could result in low-voltage power being changed to high-voltage power. If a person or animal gets tangled in the wires, they may be injured, or even killed. Adults with pacemakers and children are more vulnerable to electric shock.

Mark says the regulations do make provision for certain offences and penalties to be levied on those who fail to comply. If convicted, the homeowner may be imprisoned or fined. "It should be noted that there is already case law relating to such prosecutions," he adds. 📌

Photography: Gina Hartoog



Safe and secure

>> Gina Hartoog

Consider your needs, budget and the right location for a safe in your home

Benefits of a safe

- A place for important documents – peace of mind
- A place to keep dangerous items like knives and firearms away from children and uninformed persons
- A place to store cash and collections that are an investment
- A place to safely store items (from loss or damage) that may not be worth much but are irreplaceable in terms of their sentimental value.

Safes are not only essential for gun owners, but useful for anyone who has personal paperwork, jewellery, heirlooms, photographs and other items that cannot or may not be easily replaced. It's not only burglars we need to be mindful about, but also fire or floods that may occur without warning.

There are a number of different types of safes on the market - from wall safes and floor safes that are anchored, to very heavy safes that cannot be easily moved. Safes for guns and ammunition must meet certain criteria, in terms of the law.

A safe to suite your needs

Gavin Macdougall, product development and training manager at Yale Security, says that before you decide on a safe for your home, think about what you want to store for safe keeping.

"There are different types of safes for different applications and for certain applications, such as the storing of fire arms and ammunition, or for overnight cash storage for insurance purposes, the safe itself must be compliant to certain South African National Standards (SANS) determined by the South African Bureau of Standards (SABS)," explains Gavin. "Special application safes such as drop and deposit safes, fire resistant safes and file and office safes are some examples of safes designed for specialised or niche applications, such as protecting important documentation from fire, or the secure storage of lever arch files, or a safe ideal for a small retail environment where daily cash-ups can be placed inside the safe without the need for the safe to be unlocked and opened."

Consider budget

Next, consider your budget and how much you have to spend. Price can be relative as to how secure the safe is, but it isn't the only determining factor. "Buying a more expensive safe cannot guarantee that it will be a more secure option," explains Gavin. "Research your options and consider electronics, physical construction such as wall and door thickness, locking bolt diameters and lengths, the types of hinges used and the quality of materials used as these all impact on how secure the safe is. Consider safes that are compliant to a SABS standard because these products have been tested and deemed secure for the intended application by an impartial test laboratory."

Lock technology

There are also different types of locks available. A safe may have a standard lock and key (lock box), a dial (combination) lock or a digital lock where you key in a pin number to access the safe.

"Digital, or electronic safes, have been around for many years, but some of the new technologies that safe manufacturers, like Yale, are including in their products include, anti-bump protection, master and user codes, tamper alarms for physical attack and consecutive incorrect code attempts, and external battery connection terminals so that the safe can be powered up when the internal batteries run flat," explains Gavin.

Fireproof – or fire resistant?

While it may seem like a technicality, safes are not 'fireproof', but in certain instances a fire resistant safe may be required for added protection. Fire-resistance means that the safe is able to protect stored materials at a temperature (and within a specific timeframe) as specified by the manufacturer.

Mark Brookes, global product manager for safes and vaults at Gunnebo



Executive from Chubb safes offers certified fire protection

(Chubb safes), advises consumers to look for an independently certified product. "There are many national tests and certifications but the mostly globally recognised are the European standards EN 1047-1 and EN 15659 and the American Underwriters Laboratory standard UL 72," explains Mark. "All products certified to these standards will carry a certification plate which not only confirms the extent of the fire resistance offered but also provides the owner with confidence since the certification bodies carry out regular audits to ensure production matches original test units."

Fire testing should cover three areas – paper documents and two degrees of data media storage, USB drives, hard drives, digital backup tapes and other hardware. "Safes designed to protect paper can have an internal temperatures as high as 350 F (177 C) whereas if you are looking to protect the more sensitive types of data media storage temperatures as low as 125 F (52 C) are enough to destroy them."

Check the certification labels. 'Class 350', 'P' or 'Paper' denotes document protection while 'Class 125', 'DIS' or 'Disk' denotes the higher level of protection required for more sensitive storage media.

Lastly, all certifications have a duration which indicates the length of time the unit has been tested for but this is

not the same as to how long it would last in a fire. "Test conditions should replicate how a normal building fire develops," says Mark. "ISO 834 is a standard relating to how temperature should increase with time during furnace testing when comparing to a fire fuelled by cellulose based materials – wood, fabrics, building materials and others. A fire doesn't burn at its maximum temperature for the duration of the blaze."

Location and installation

There is no right or wrong location for a safe in your home, but this rather depends on your lifestyle and what you want to keep inside the safe. Mark suggests a place where the safe is convenient for you. If you use it for jewellery, a main bedroom would make sense, or if you use it for documents, a home office could be a better option.

Having a small safe that isn't anchored does not serve much purpose. "You are putting your valuables in a handy package and making it easier for a burglar to carry off your possessions," says Mark. "Always have a safe installed where it can be correctly anchored to the floor or wall around it. Somewhere with a good solid or concrete floor or if the safe allows rear fixing, good internal walls. Always check to make sure there are no cables, pipes or other services in the way before you or your contractor start drilling to install the safe. Safes weighing up to 1000kg should always be correctly fixed in line with the manufacturer's instructions." ■



Secure your laptop, money, jewellery and important documents in Yale's laptop safe

Images courtesy of Yale Security and Gunnebo

Redesign a driveway gate

Replacing an existing gate can be very costly, so why not use the existing frame but change the style to suit your new requirements?

Project guide

Difficulty: Intermediate

Estimated cost: R 3 800

Estimated time: 1 to 2 days

Tools

- Grinder
- Welding machine
- Electric drill
- Tape measure

Materials

- Tek screws or nuts and bolts
- Rawlbolts or coach screws
- Twenty lengths of 1,8m x 225mm x 38mm
- 12m of 38mm x 76mm rectangular tubing
- Two 450mm lengths of 38mm x 76mm rectangular tubing
- Nine 1,5m lengths of 10mm round bar
- 9m of 25mm x 5mm angle iron
- 10m of 50mm x 5mm flat bar
- Primer and top coat
- Varnish and turpentine

>> André Gous

I recently had the opportunity to help a friend revamp his existing entrance gate. Although it was an aesthetically pleasing gate, he felt that he wanted more privacy. After a number of discussions and ideas back and forth, my friend settled on a completely new

look that suited their new home. The challenge was not the fact that it was a very large and heavy gate, the challenge was to complete the project in one day, for security reasons. We also wanted to use as much of the existing metal as far as possible.

The original gate



NOTE: Your metal requirements will differ according to the size of your existing gate and style of the new gate.

Step-by-step gate redesign

Step 1: We took the gate off its track and placed it on its side and cut out all the unwanted metal. We kept the original main frame.



Original gate is removed



Grind the original gate

Step 2: Next, we determined the centre of the frame and welded the cross beam (one 5m length of 38mm x 76mm) in place.



Cross beam

Step 3: Then we welded a 50mm x 5mm flat bar onto the bottom part of the main existing frame and did the same on the top part of the frame. This was done to create stronger anchor points for our new wooden slates



Weld the top frame

Step 4: Not only did we decided on a new jacket for an old gate but we also wanted to add more height to complement the existing walls on either side. We cut one 5m length of 38mm x 76mm rectangular tubing as well as two 450mm lengths of 38mm x 76mm rectangular tubing. We welded each of the 450mm tubing on either side of the 5m tubing with a 45° angle to create a 90° corner. Next, I welded this in place on top of the existing gate frame.

Step 5: Remember we only had one day to complete the main gate for security reasons. I had already bent the scrolls the previous day. To make the scrolls: use 10mm round bar and cut nine 1,5m lengths and bend it into soft scrolls on either side. Remember to bend each end into the opposite direction. Weld the scrolls as you like into the new extended frame. I used a 25° angle to form my new pattern.



The scrolls



Weld scrolls in place

Step 6: Grind off excess flux and prime.

Step 7: While waiting for primer to dry, I measured the spacing where the wood slates needed to go (75mm) and made a mark with chalk.



Measure the wood

Step 8: Next, cut twenty lengths of 1,8m x 225mm x 38mm wood. Sand all the pieces and paint the first coat with a mixture of 50/50 turpentine and varnish. Due to the time constraints, I prepared this step the previous day.

Step 9: Spray a final coat on the frame. I recommend a quick drying spray paint for your project

Step 10: Once your frame has dried use tek screws and place wood in position. Screw down from the outside.



Fit the wood



Fasten from the outside

Step 11: Install the new track. We installed our new track on top of the old one as our foundation was very strong. I drilled 10mm holes for my new eyelids to secure the new track down with coach screw and plugs. I then tack welded all the tek screws on the inside of gate and ground them off smoothly. If required you can touch up with paint.



Drill holes



The new track on the old track



Fasten in place

Step 12: Finally, apply a final coat of varnish on the wood (no dilution). 📌

TIP! I recommend that you varnish your wood every three to six months.

ABOUT ANDRÉ:



After a period of unemployment, André turned his 20 year hobby into a business. He later suffered a setback when his tools were stolen but the tide turned when he won *The Home Handyman's* wine rack competition and became a regular contributor.

Glaze A TRAIL

Remove and replace a broken window pane

If a glass window pane cracks, you can replace it yourself. The first step is to purchase the correct size glass. Take measurements of the frame, or better yet, take a template to the glass merchant and have them cut the glass to the correct size and shape.

Take care when removing the cracked pane. Make sure you have good quality work gloves and eye protection before attempting to remove a pane of glass. Cover the pane with broad tape or use plastic sheeting for large windows. Leave the sides open so you can get to the putty. Use a hammer and gently tap the glass to break it into smaller pieces. The tape or plastic will hold the glass in place and prevent a mess.

REGLAZE THE WINDOW

Step 1: Assemble your tools

You will need a hammer, putty knife, putty for a wood or steel frame, linseed oil and mineral turpentine. About 500g of putty will glaze approximately one metre of frame.

Step 2: Remove old putty

Using a putty knife and hammer, remove the putty and any remaining glass. The old putty can be tapped out. Ensure all old putty, dust and loose particles are removed from the frame. Never use a screwdriver on a wooden frame as it will damage your frame.

Step 3: Prepare the frame

For wooden windows, apply a coat of raw linseed oil to the frame. This will prevent the oil in the putty from being pulled into the wood, causing it to dry out too quickly and crack. For steel frames, treat any exposed metal with a suitable metal primer.

Step 4: Prepare the putty

Work the putty by hand to make it smooth. Add a little linseed oil to soften

it or leave it in the sun while you take out the glass.

Step 5: Putty the window

Apply a thin bead (like a rope) of putty to the window recess – use your thumbs, it makes it easier. Shape and smooth with a putty knife. If the putty is a little sticky, dip the knife in turpentine.

Step 6: Install the glass

Press the glass pane firmly but gently into the putty. Always press along the sides, into the putty, never in the centre of the glass.

Step 7: Outside putty

Apply more putty to the outside of the glass. Use a putty knife to shape the 45-degree angle at the corners of the windowpane so that the putty slopes from the glass down to the frame.

Step 9: Drying

Clean the glass with methylated sprits or turpentine. Leave the putty to dry completely, between seven to 14 days, but don't leave the putty unpainted for longer than 17 days. ■



Let's **braai**

>> Gina Hartoog

Turn a good braai into a great one with the right unit and fire fuel based on your preferences



South Africans love their braais. The braai fire is the place where friends and family gather to socialise and enjoy the perfect cut of meat – from legendary lamb chops to rousing ribs. Our rich history and vibrant culture is celebrated annually on Heritage Day on September 24th.

On the same day, people around the country come together around the braai for National Braai Day. The initiative was started in 2005 by Jan Scannell, known as Jan Braai, with the aim of finding common ground amongst the rainbow people of our country. The menus we prepare may not be the same, but we share a common goal – to light the fire and get it just right before we get to the cooking.

Types of braais

Let's take a look at the different types of braais available and what they have to offer.

Flat grid braai

The flat grid braai is a firm favourite among many traditional braai masters, whether build-in brick and mortar braais with chimneys or portable units. The type you choose will depend on your needs and the space you have available. With a quality mild or stainless steel braai grid, the sky is the limit as to what you use as a braai box. So with a bit of DIY savvy, you don't have to buy the most expensive unit on the market. Try a metal drum or wheel rims.



Charcoal gives a smoky braai flavour to the meat

Braai with a French flare

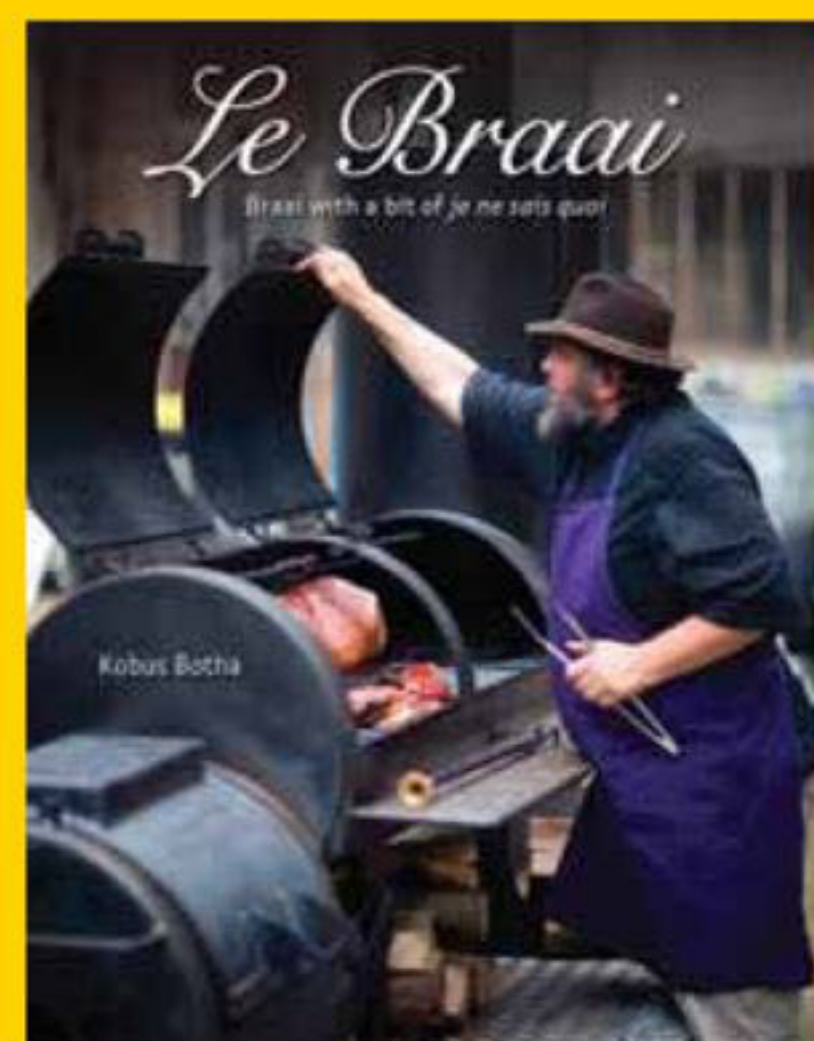
If you fancy a braai with a little French spin, get your hands on a copy of Kobus Botha's new book, published in August by Struik Lifestyle. You can put your own *je ne sais quoi* on the humble South African braai.

Kobus Botha was raised in the Karoo and has established himself in France, setting up his custom-made mobile barbecue at fetes, functions and outdoor events.

Le Braai is a collection of recipes that captures Kobus's essence and dishes up the best South African flavours with a French flare. The book includes a section on braai equipment, making the fire, choosing ingredients and various cooking methods. With over fifty recipes from pork ribs and prawns, to fruit and vegetables, breads and fish dishes, the book also contains Kobus's own anecdotes and is as much a feast for the soul as it is for a food aficionado.

ISBN: 978-1-43230-917-6

RRP: R250.00



Don't start a fire close to anything that is flammable, for example a thatch roof or pile of wood

Fire safety around the braai

- Make your fire in an open area that is well-vented. Don't start a fire close to anything that is flammable, for example a thatch roof or pile of wood. Sparks off the braai can be hazardous.
- Keep a bucket of sand or a fire extinguisher close at hand. A DCP powder extinguisher can be used on class A, B and C fires.
- Most braai starters and accelerants are very safe to use as they have a high ignition point but always read the manufacturer's guidelines carefully so you know exactly how to use the product.
- Some people still use petrol/diesel to start a braai. This is very dangerous as it has a low flash point and is explosive on ignition.
- Any smoke is dangerous and in a confined space can reduce the oxygen to a point where it can kill you. Always braai in a well vented area or outdoors.
- Extinguish your fire before you go to sleep, as an unattended fire is always dangerous.



Resource

Lance Tempest – Tempest Fire Services



A gas braai is fast and efficient

So what's best to burn - wood, charcoal or briquettes? The decision is often a personal one. All three have their pros and cons. Charcoal burns hot and provides a smoky flavour which many South Africans enjoy, while briquettes are cost-effective and easier to keep at a consistent temperature. For many, the ambience of a wood fire is what provides that true braai experience, even though temperature can be difficult to control. Before choosing wood, see the box 'What wood is good?'

Plus points

- Build-in braais are a good investment for your home and form part of the outdoor landscaping of your garden, providing a place for entertaining guests.
- Portable braais come in a range of different shapes and sizes and can be taken with you on holiday. You can also move the unit to a different location should the wind direction blow smoke at your guests.
- Choose a unit that allows you to adjust the grid height to allow you to control temperature.
- Removable ash trays make for an easier and faster cleaning job.

Kettle braai

A kettle braai is a popular choice due to its portability, with the added benefit of a dome-shaped hood that distributes heat better than an open braai and allows for

a faster cooking time. The kettle braai also gives you freedom of choice as to what fire fuel you want to use, with the same benefits as noted on the left. On some units the grate height can't be adjusted so you need to time your cooking accordingly.

Plus points

- Units come with a range of add-on accessories which allow you to experiment with your cooking, tackling anything from rotisserie chickens to smoked meats.
- They are also useful for cooking fish and other seafood. You can also purchase a potjie grid which fits over the braai and acts as a stand for your potjie pot.
- Kettle braais are known for their smoky flavour.

Gas braai

While many traditional braaiers don't believe that when it comes down to it, cooking on gas is a 'real South African' braai, but the upside to any gas cooking appliance is that it is fast. Once the burner is lit you can start cooking. If you don't have time to sit around waiting for the fire, gas is your 'go to' option. The popular 'skottel' braai is also portable and you can cook a variety of foods – from a traditional English breakfast with eggs, bacon and sausage, to meat or stir-fry - with ease. Larger gas braais for use at home have a cooker hood which

distributes the heat evenly, allowing you to experiment beyond 'tjops 'n wors'. You can also control temperature with the thermostat on some models. Always use a grill brush to remove residue before you begin cooking.

Plus points

- Super handy to have when your power is down (load shedding).
- Less smoky.
- A number of accessories on offer, like rotisseries for roasts.
- Easy to clean after cooking.
- With a side gas burner, you can make a steak sauce or keep the pap warm as you braai your meat.

Cooking safely with gas

The Liquefied Petroleum Gas Safety Association of South Africa (LPGSASA) urges all LPGas users to ensure the safety of their LPGas braai cooker or appliances. Whether it's the master cooker or a 'skottel' braai, compliance to safety must be ensured at all times.

- Ensure the appliance you use has been verified by the LPGSASA and has an existing Verification Permit (required by importers/manufacturers).
- The cylinder, which is connected to your LPGas braai, should be placed on a firm, flat, level surface and kept upright at all times when being used outdoors.
- The cylinder should be kept well away from flames, sparks and excessive heat.

- Users of LPGas who have their cylinders filled or exchanged must ensure that this has been done through a reputable dealer and has been legally filled.
- When using LPGas equipment, users must ensure that the equipment is used in accordance with the manufacturer's specifications – read the instruction booklet.
- When you have finished using the braai, always close the cylinder valve first. You can then shut off the appliance – if it has a shut off device. The cylinder valve should be kept closed at all times when the appliance is not in use.
- Make use of prescribed accessories with your LPGas braai.
- Cracked or damaged hoses should not be used and should be immediately replaced with an approved LPGas hose.
- The regulator, which fits into the cylinder valve, should be regularly checked. The 'O-ring' or bullnose (the rubber seal or washer located at the end of the regulator) should also be checked to ensure that it is not cracked, perished or worn and is still securely in position.
- Before use, all connections should be properly checked with an appropriate leak test, for example, the soapy-water leak test.
- For registered gas practitioners or for safe appliances, please visit the website - www.lpgas.co.za. Click on the 'Safety' tab. 📄



What wood is good?

Samuel du Plessis of Joburg Firewood answers some braai wood questions.

Q: What types of wood are good for the braai?

A: The best types are hardwoods that make good coals. These include sekelbos, bluegum and kameeldoring. Sekelbos is the most popular and easily accessible braai wood in South Africa. Due to its ability to make lots of coals and give off high heat for the braai it is definitely a preferred choice.

Q: What wood is best avoided?

A: Try to avoid any type of softwoods as these tend to burn to ash and will not leave any coals. You can use softwoods to get the fire going as hardwoods tend to be more difficult to ignite.

Q: Are there any dangerous woods that should be avoided?

A: When braaiing it's best to stick to a firewood that you know. If you gather wood in a remote place, to avoid burning poisonous woods it would be best to talk to the locals as they would be knowledgeable on the local trees and what is safe to burn.



Kettle braais are versatile, allowing you to experiment with different food types

Good to know: Never burn tamboti wood or jacaranda pods. Conifers have a resin that gives off a bad smell and taste. Only burn seasoned woods.

Our plastic planet

As plastic and its manufacture continue to overwhelm our planet, we take a look at why recycling should be a priority for everyone



>> Kim Roberts

Did you know?

Holland, India and Scotland are building roads from recycled plastic, making effective strides to solve the plastic pollution problem. In 2015, India mandated that all road developers in the country use waste plastic, combined with bitumen, to construct roads. These roads offer a longer lifespan, are low maintenance and depending on the method used, easy and quick to construct. With less tyre resistance, they may even offer better fuel economy.

Globally, over eight million tonnes of plastic is dumped into our oceans every year. Natural ecosystems are choked up with our waste and environmental stakeholders are desperate for change. South Africa is the one of the worst offenders for marine plastic pollution in the world. A research study at a United States university ranked South Africa at number 11 on a list of 20 countries who generated high volumes of mismanaged plastic waste.

Originally, a United Nations initiative, World Environment Day, commemorated annually on 5 June, motivates all to work toward reducing pollution of any kind. The theme for 2018 highlighted growing concerns about plastic pollution, how to prevent it and encourage solutions toward healthier ocean eco-systems. Plastics do not biodegrade but only break down into smaller pieces, which can be harmful to marine wildlife. Around 100,000 marine creatures are killed by plastic annually.

Global initiatives

Governments, communities and industry are to explore sustainable alternatives to oil-based plastics and to reduce production and the unnecessary use of single-use plastic products. Individuals can make a difference toward conserving and protecting our environment and the threatened marine environment.

Common problems of littering and illegal dumping must be stopped. Various national waste awareness programmes have been educating all South Africans to clean up and take responsibility for their neighbourhoods through various campaigns. Kigali in Rwanda is 'Africa's cleanest city' due to this

concept. Increased effective recycling of all existing plastic products will also contribute to beating this waking monster.

John Duncan of the World Wildlife Fund's (WWF) South African Marine Programme strongly supports efforts not to use single use plastics in a bid to minimise the plastic clutter. These items are used for a few minutes, then thrown away to 'outlive' humans, cluttering our environment for a couple of hundred years!

According to the Minister of Environmental Affairs, Dr Edna Molewa, the Department of Environmental Affairs (DEA) is committed to minimising plastic pollution. The DEA will introduce measures to curb plastic pollution by phasing out the use of micro-beads, reduce single-use plastics and work on resolutions outlined in a plastic material flow study. There is also a possibility of a ban on some plastic products, notable single-use plastic straws.

Why recycle?

All South Africans have a duty to improve waste management, recycling systems and research and implement

alternatives to plastic. Recycling keeps plastic out of landfills, the environment, fragile marine ecosystems and reduces the amount of new materials made. This lessens plastic pollution in the long term and keeps both humans and animals safe from toxins and plastic related dangers.

According to the annual plastic recycling survey by Plastics SA, published at the end of 2017 for the 2016 year, 41.8% of plastics were recovered for recycling in South Africa. As of 1 July 2018 some areas in Johannesburg, by law, must recycle household waste.

When asked what it would take to mobilise people to participate in solving plastic pollution, CEO of Wildtrust, Dr Andrew Venter said that through social media and television campaigns, the growing outrage against the 'tide of plastic pollution' has really mobilised consumers to ask if the packaging is necessary, recyclable and actually recycled.

Dr Venter also added that in poorer areas South Africa needs to put effective subsidies in place to incentivise plastic (and other) waste collection.

Dr Venter said that packaging producers need to be supporting the collection, processing and recycling of their own final products – the producer pays principle, but that this was not occurring. "An additional 14c per packet used for chips, or an additional 20c per packet used for soap powder would allow for the packaging to be collected and upcycled into desks or other useful items," he added.

When asked if South Africa would ever lay roads using recycled plastic like Holland and India, Dr Andrew Venter answered: "It will take a decade or longer. However, it is likely that this material will be used for private paving and community road infrastructure in the near future, driven by local entrepreneurial and charitable innovation." 📺

Recycling at home

- Start today. Split your household waste to cut down on the amount of rubbish you send to the municipal dump. Set up a convenient system of small bins and sort/rinse as you throw out – all it takes is two additional bins and a little time.
- Research and implement local recycling options. Find depots or drop-off points in your area.
- Learn more about recyclable plastic and know the meaning of plastic recycle symbols.
- When shopping, pay better attention to the items you purchase and choose items in plastic that can be reused or recycled.
- Find ways to reuse plastic containers at home. For example, use ice cream tins as lunch tins, or nursery planter pots to grow your own seedlings.

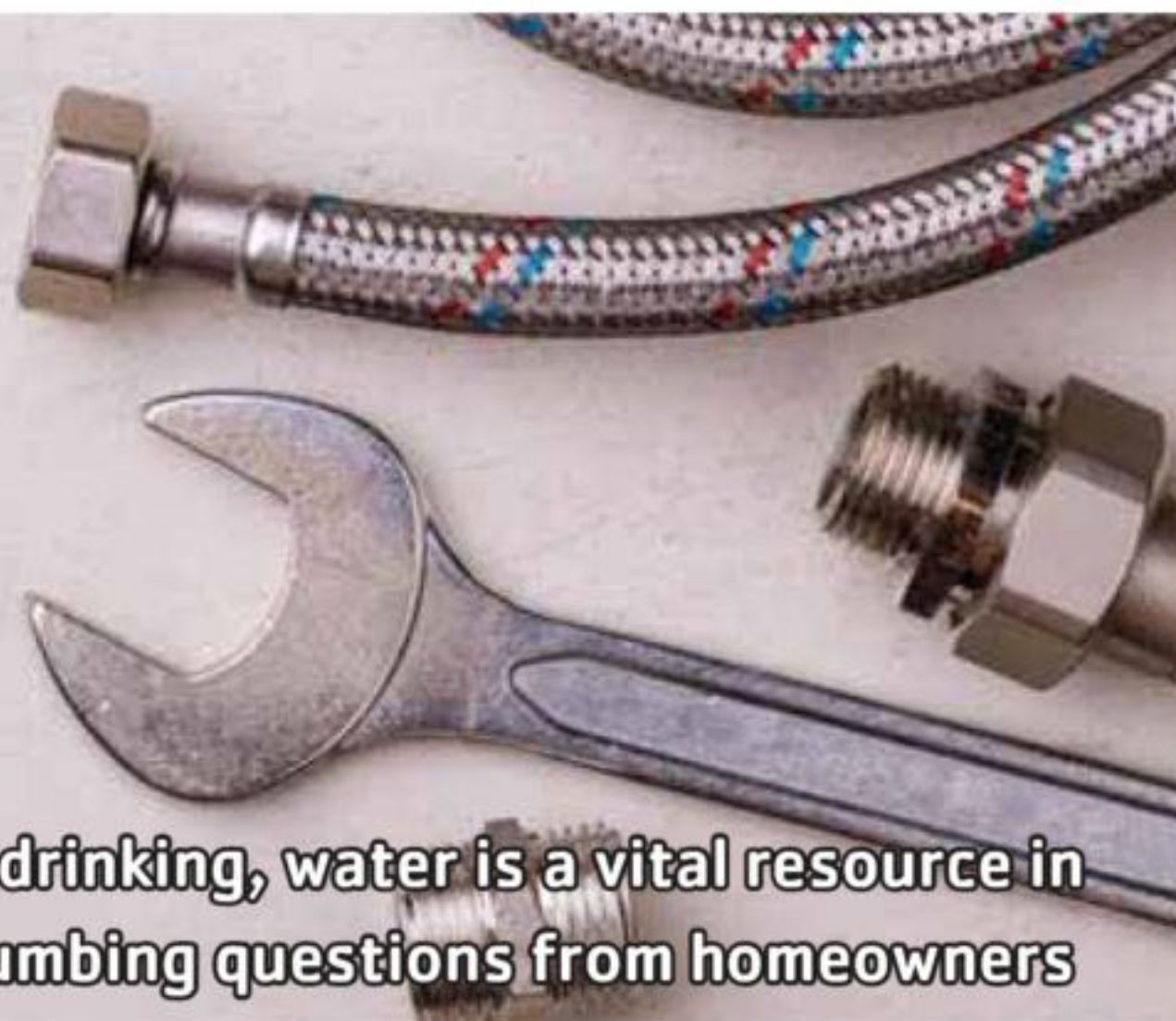
Recycling type	Material	Containers	Recycled into
#1	PET or PETE (polyethylene terephthalate)	Water, soft drink bottles, salad dressing, beer, vegetable oil and peanut butter bottles.	Furniture, tote bags, polar fleece, new beverage containers and carpets.
#2	HDPE (high density polyethylene)	Milk, juice bottles, cereal box liners, yogurt tubs, cleaning product bottles and some rubbish bags.	Pens, building materials or back into bottles.
#3	V (Vinyl) or PVC	Shampoo, detergent and window cleaner bottles, piping and medical equipment.	Building materials (occasionally).
#4	LDPE (low density polyethylene)	Bread bags, dry cleaning and plastic shopping bags and squeeze bottles.	Lumber, shipping envelopes and bin liners.
#5	PP (polypropylene)	Syrup, tomato sauce, pill bottles (and lids), some yogurt containers and straws.	Batteries, rakes, trays and brooms.
#6	PS (polystyrene)	Egg cartons, compact disc cases, take-away containers, aspirin bottles, disposable cups and plates.	Insulation, more egg cartons, take-away containers and foam packing.
#7	Miscellaneous	Sunglasses, nylon, iPod cases, DVD's, 'bullet-proof' materials and large water bottles.	Not often recycled.

Plastic recycling





From washing and cleaning to cooking and drinking, water is a vital resource in your home. We address some water and plumbing questions from homeowners



I'm having a solar water heater installed. Do I need any certifications for the work?

A plumbing Certificate of Compliance (CoC) will be issued for most plumbing work, including:

- Where the total value of work, including materials, labour and VAT, is more than R1500. The material costs must be included, regardless of whether the materials were supplied by another person.
- The installation, relocation or replacement of any electric water heating system, regardless of the cost.
- For every separate installation on a site.
- The construction, installation or alteration of any above or below ground sanitary drain; regardless of the cost.
- The installation, relocation or replacement of any hot water solar water heating system.
- The installation, relocation or replacement of any heat pump water heating system.

Source: Plumbing Industry Registration Board (PIRB)



What is a stopcock and where can I find it on my property?

Is it important to know where your property's stopcock is located – just in case you have a burst pipe and need to turn off the main water supply to your home in an emergency. The stopcock is fitted onto the main water line to your home. It may be above or below ground and near an outdoor tap or close to your water meter. By closing the stopcock, you halt the water supply to your home. Locating the stopcock isn't only important for plumbing emergencies but you may need to shut off the water in order to fix a small plumbing problem or replace taps. Because of the location of the stopcock, the area around them can become overgrown with vegetation or covered in debris. Locate yours, then clean away the area if required.





What is a multi-detector or wall scanner?

Definitely a tool no DIY homeowner should be without, especially if you regularly need to drill into walls and aren't sure where your electrical or water pipes are. A multi-detector will prevent you from making a costly mistake! Detectors are designed to detect water pipes, live wiring, wood and other materials in walls.



I think our chrome-plated shower head is clogged as the spray isn't as strong as it used to be. How can I clean it?

Mineral deposits have likely clogged the holes and you can solve the problem with minimal fuss. Vinegar is a natural cleaner and is brilliant for cleaning away mineral deposits and soap scum. Fill a plastic freezer bag with vinegar and place the bag over the head, tying it in place using a rubber band. You can also remove the head and place inside the bag. Ensure the whole head is submerged in the vinegar. Leave overnight. In the morning, give the head a good scrub with a soft bristle brush and wipe clean with a damp cloth. This method should not be used on brass or brass-plated fittings and if you have marble or granite tops in your bathroom, avoid spilling vinegar on them as it can stain.



The drain outside my kitchen door is overflowing and smells. What can I do?

The problem could be a simple one – leaves and other debris may have clogged the grate cover. Remove any noticeable debris and flush with boiling water. You can also use a commercial drain cleaner – but read the manufacturer's instructions very carefully as they can be dangerous.

If there is no debris on the top of the grate, lift it up and check below. A thick, compacted, blockage may be found on the underside of the grate. Clean with bleach and warm water. Always wear gloves when working with an outdoor drain. If the grate underside looks clean, the blockage is further along the pipe. Insert an auger carefully into drain and move it along. It may be enough to push the blockage along, or snag it so you can remove it.

If the blockage is even further along the pipe, you will need to hire a plumber with drain rods to prod further along. Drain rods are flexible so they are able to bend and twist along the pipe. If none of these solutions work, the pipe itself may be broken and you will need to dig up the area surrounding the drain to identify the problem. If pipes have perished or cracked and you are not able to replace them yourself, hire a plumber to replace them.

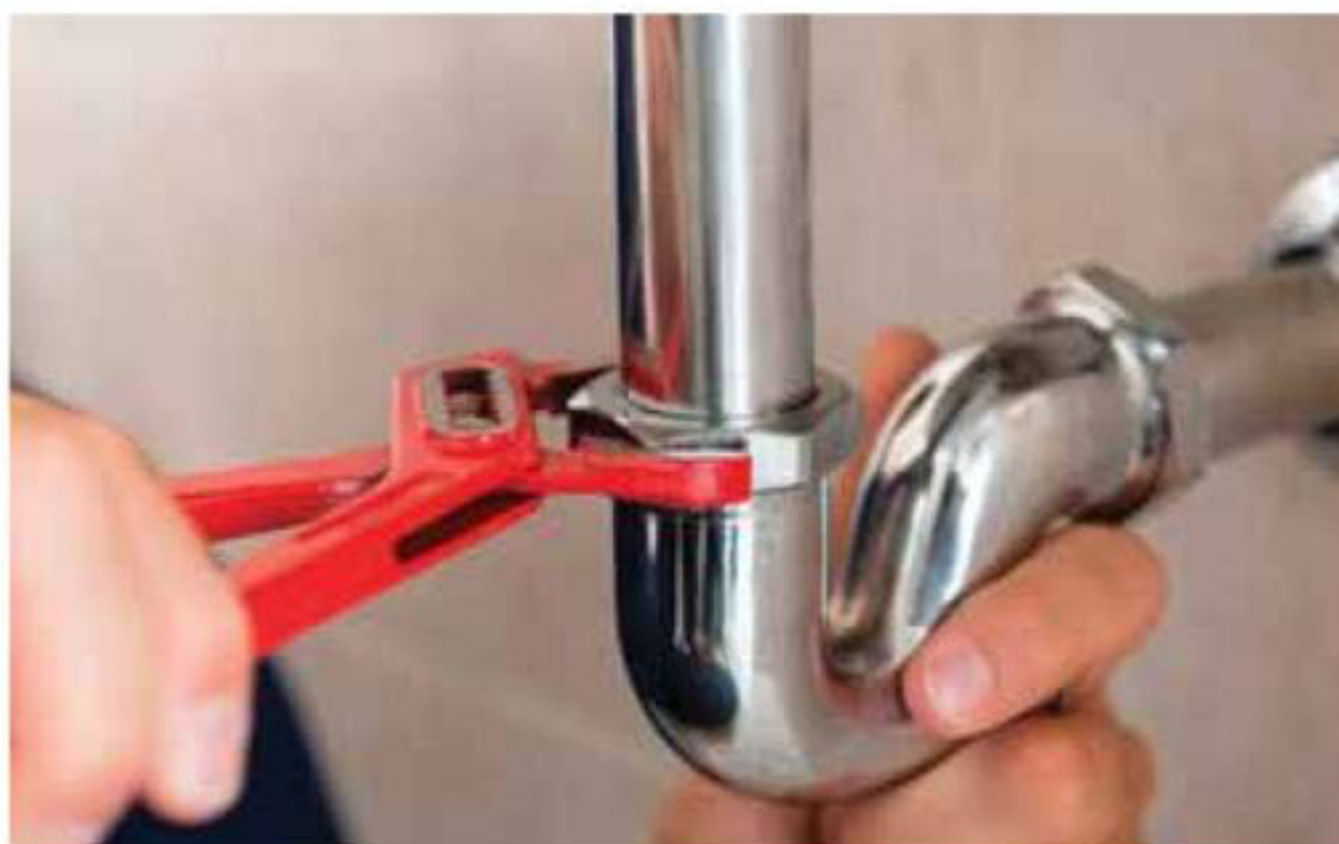




**The basin in my bathroom fills with water and drains away very slowly.
What can I do to fix the problem?**

If the basin is very full, first bail out some water. A rubber plunger can create enough pressure to dislodge the blockage. Place the rubber plunger over the drain trap and push down gently to create a vacuum. Now, pull up the plunger handle. If the water does not run freely, repeat the steps a few more times. If this does not solve the problem, there may be blockage under the trap. Put on a pair of cleaning gloves and remove the trap. Remove any solid debris and clean the underside with household cleaner and hot water.

If the trap underside is clean and the water still does not drain away, the problem may lie in the U-bend joint. Place a bucket under the pipe and loosen joint. Tip the pipe down to allow waste water to run into the bucket. Use a wire to dislodge blockages. If the blockage is further along the pipe, you'll need to use a plumber's auger which you feed down the pipe. Once you feel some resistance, prod a little more, then pull up the auger. The front hook is designed to hook solid material it comes across. Keep a bucket and cloth ready to catch the debris as it comes out.



After the recent drought across the country, I'm really taking water saving more seriously, How can I save?

- Attend to water leaks quickly. Leaks can waste hundreds of litres per month. If you have a tap leak, check and replace the seal. If this doesn't solve the problem, you will need to replace the tap.
- Fill up your dishwasher and washing machine and run a full load. If you do wash dishes by hand, use a half-filled sink or plastic basin for rinsing, don't run the tap. Don't rinse fruit and vegetables under running water.
- A five minute shower uses less water than a bath. Install a water-saving shower head. The average head uses about 25 litres of water per minute, compared with nine litres of water for a water-saving head.
- Save even more water by placing a bucket inside the shower to capture grey water to use on your plants.
- If you have an older toilet cistern (about 12 or 13 litres per flush) in your home, consider replacing it with a low flush system. Check toilet cisterns for small leaks that may go undetected.
- If you have a swimming pool, use a pool cover to limit water evaporation and keep your pool cleaner. You'll save money on water and electricity.
- If you do need to top up your pool in the rainy season, attach flexible pool cleaner pipes to a gutter downpipe and harvest rainwater from your roof directly into the pool. 🏠



GARDEN TOOL CARE

Get your tools ready for spring gardening

There's no getting around it, garden tools are expensive but they're probably the most neglected tools in the shed or workshop. Gardening tools are often packed away wet and dirty. Without proper care, they're likely to rust and break and eventually find their way into the bin.

1. CHECK

Examine mower blades. If blades are damaged, replace them. Blades in good condition can be sharpened in spring and after every eight to ten uses throughout the summer. Use a fine metal file for sharpening.



2. MAINTAIN

At least once per year give your tools some extra TLC to keep them in good condition. Start with tools that have wooden parts. Clean thoroughly with a little water to remove dirt. Sand down handles with a fine grade sand paper to remove splinters and even out rough areas. Next, apply a light coating of boiled linseed oil to all wooden parts. This helps to prevent the wood from drying out and cracking. Check metal parts and replace rusty or damaged screws. Tighten any nuts,

screws or bolts. Spray blades and bolts with Q20 or similar to prolong the life of the tool.

To remove rust from handsaws or clippers use a commercial rust remover or make a paste with lemon juice and cream of tartar. Apply the paste using a damp cloth and rub gently to remove the rust. Use steel wool or a wire brush to remove rust on spades, shovels, picks or your wheelbarrow. Epoxy repair paste can be used to fill in any holes.

3. SHARPEN

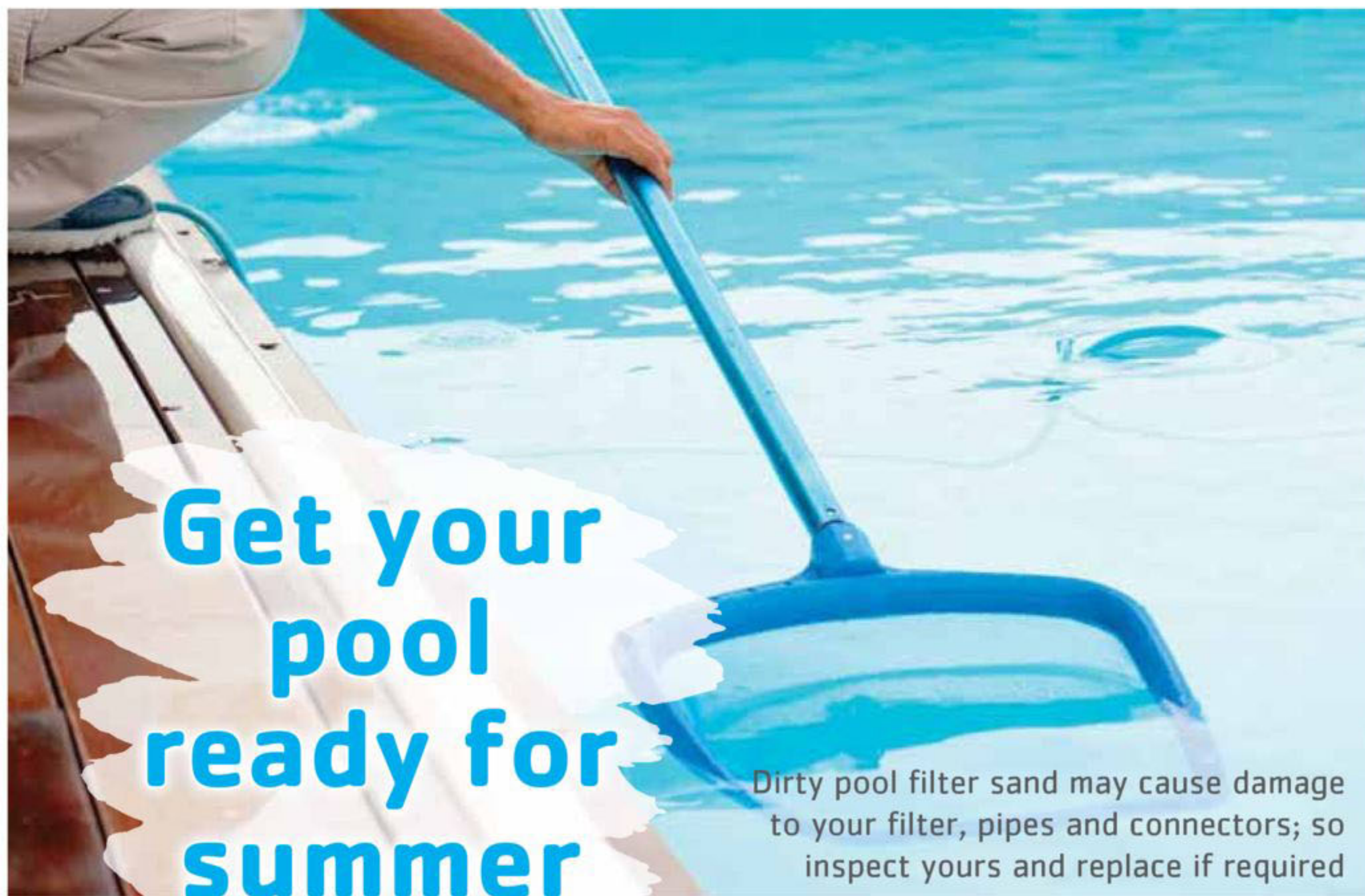
Secateurs and loppers should be sharpened every spring. Sharpen only the cutting blade on the bevelled side. Remove any built up plant sap on the blades with fine steel wool and vinegar. Loppers can be clamped in a bench vice while sharpening. Hold secateurs firmly in one hand while sharpening with the other. Start with a medium grade diamond stone and finish with a fine grade stone. Keep these tools well tightened and lubricate the bolt that holds the handles together.

Bigger tools like spades, shovels and hoes can be sharpened with a steel file. Secure the tool well and use a mill bastard file to sharpen. Check at which angle the tool was originally sharpened at and file along the cutting edge at this angle. Files cut on the push stroke so don't drag it back and forth - you'll only be abusing your file. Continue filing until you have restored the sharp edge.

4. CLEAN

After use, wash off tools before packing them away. Rinse thoroughly with a hose or if you have water restrictions in your area, save grey water from your bath or shower to clean

the tools. Allow to dry in the sun. After any pruning, clean tools in warm soapy water to clean off any sap that may stick to the blades. 📌



Get your pool ready for summer

Dirty pool filter sand may cause damage to your filter, pipes and connectors; so inspect yours and replace if required

3 signs your filter sand needs replacing

1. Do a physical test. Remove some sand from the filter and inspect it. If the silica is muddy and compacted, the sand should be changed. Backwashing alone might not work.
2. The pool cleaner works in intervals – it runs and stops.
 - Stop the pump.
 - Place the filter on bypass (which will bypass the filtration action and not run water through the sand medium).
 - Start the pump again. If the pool cleaner works, the sand is the problem.
 - Inspect the sand before replacing as it might just need a good backwash.
3. Check the pressure. If the filter has a pressure gauge on the multiport valve, you will see a rise in pressure. A normal operating pressure for a sand filter is around 0.8 bar pressure. Should this rise to over one bar, this means that the sand is dirty. Again, a simple backwash could rectify the problem."

Oelrich du Toit (Speck Pumps)

As the days get longer and the weather gets warmer, you'll be looking to get your swimming pool ready for the new swim season. Here's a question to ask: when last was the sand in your pool filter replaced?

Oelrich du Toit of Speck Pumps says that the purpose of sand is to trap particles or remove suspended solids like oils, hair and other debris from the water. "These particles are trapped around the rough edges of the sand grains," he explains. "Silica is a hard sand but over time it's effectiveness to trap particles declines. By backwashing regularly, the particles and soil that may impede the sanitation effect are removed."

There are different opinions on how often one should replace the sand in the filter. Oelrich says these opinions differ from once per year, to every two years, or even every five years. "A pool owner should inspect the sand once per year and then determine if it needs replacing," he advises. (See the box '3 signs your filter sand needs replacing').

By changing your sand when needed, you can prolong the life of your filter. "Silica does not remove bacteria from the water but it does remove soil and oils that might impede the sanitation effect of the silica," says Oelrich. "The dirtier the sand, the more pressure there is inside the filter and in the long run this can cause damage to the filter, pipes or connections."

Remove the old sand

Step 1: The pump must be switched off before you begin.

Step 2: Unscrew the lid screws to open the filter lid.

Step 3: Place the screws into the rim holes and tighten them. This will prevent sand from getting into the holes. Keep the washers in a safe place.

Step 4: On the inside of the tank, cover the top vertical pipe with a bag, or cloth, to prevent sand from entering the pipe. Use an elastic band to keep the bag in place.

Step 5: Use your hands, or a scoop, to remove old sand from the unit. Rinse the tank with water.

Add the new sand

Step 6: Before adding sand, fill the tank with water. Stop below the top horizontal pipe (on a side mount filter). The tank will be about half full. See the diagram.

Step 7: Pour sand into the filter.

Step 8: Stir occasionally to ensure even distribution of sand. Add the remaining sand. Stop below the top horizontal pipe as noted in step 6.

Step 9: Ensure all sand on the top of the filter rim is cleaned away.

Step 10: Remove sand from the plastic bag/cloth, then carefully remove it from the vertical pipe.

Step 11: Check that the pipe is clean. If sand particles are present, blow them out.

Step 12: Remove the screws from the rim holes and place the filter lid back into position.

Step 13: Use your fingers to tighten the screws to hold the lid in place, then use a flat screwdriver to tighten them further. Do not over tighten. Tighten screws opposite one another – do not tighten them in a circular pattern around the lid.

Step 14: Select 'Backwash' on the multiport valve and switch the pump on. Once clear water is visible on the sight glass, switch the pump off.

Step 15: Select 'Rinse' on the multiport valve and switch the pump back on. Again, watch for clear water on the sight glass, then switch the pump off.

Step 16: Select 'Filter' on the multiport valve and start the pump. Normal filtration will now commence.

Pool, Spa &
Koi pumps,
filters and
accessories

SPECK 
pumps

The greatest name in swimming pool, spa and bathtub pumps in South Africa and throughout the world.

After more than 49 years Speck Pumps SA continues in the fine tradition of manufacturing and producing innovative, superior designed high quality pumps for the swimming pool, Koi and spa industries together with the back-up of outstanding service and a spares network nationally, the rest of the African continent and the Indian Ocean Islands.



HEAD OFFICE

CAPE TOWN BRANCH

P.O.Box 39340
Capricorn Square, 7948
Unit 7, Southern Cross Village
Capricorn Boulevard South,
Capricorn Park, Muizenberg,
7945
t +27 21 704-1143
f +27 21 703-4374

DURBAN BRANCH

P.O.Box 267
Pinetown, 3600
Unit 1 & 2, Goodwood Park
10 Goodwood Road,
Westmead, Pinetown,
3610
t +27 31 700-8005
f +27 31 700-8006

JOHANNESBURG BRANCH

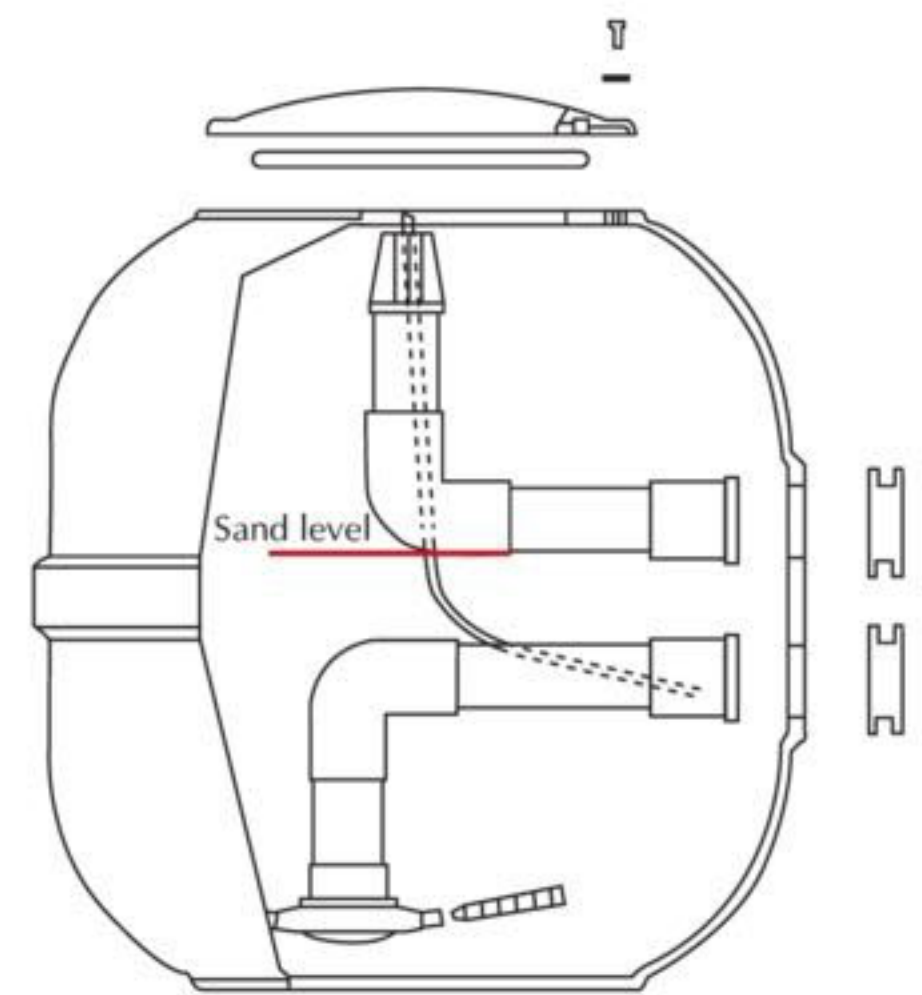
P.O. Box 2425
Bedfordview, 2008
4 Bart Street,
Wilbart, Germiston,
1609
t +27 11 455-4300
f +27 11 455-1949

PRETORIA BRANCH

P.O.Box 2425
Bedfordview, 2008
Unit 4, 123 Mosaic Street,
Silvertondale, Pretoria,
0184
t +27 12 804-1294
f +27 12 804-1295

www.speck-pumps.co.za

marketing@speck-pumps.co.za



Cross section filter diagram

Poolside safety

Follow these important safety rules this summer season:

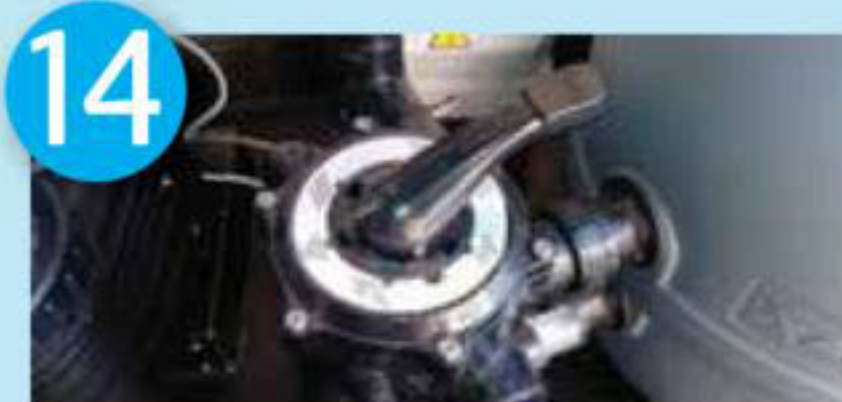
- All bodies of water on your property must have a safety net or pool cover.
- Watch the children around the pool. Pool toys are not floatation devices.
- Never allow pets to swim unsupervised.
- Always replace the net or cover after swimming.
- Nobody (even adults) should swim alone.
- Never throw a child or animal into the pool to 'force' them to swim. 🚫

Tools & materials

- Flat screwdriver
- 1 to 3 bags of new filter sand (Silica - 45 to 55mm)
- Small plastic bag/cloth
- Soft cloth (cleaning)
- Elastic band

Resource

Information courtesy of Speck Pumps South Africa (www.speck-pumps.co.za) Photography by Gina Hartoog



Spring-clean your garage

Plan now for better storage and a more functional space

>> Gina Hartoog



How cluttered is your garage? Is there space to park your car or accommodate a small workshop? Do you utilise the space to store items like bicycles, pool toys and camping equipment?

A cluttered space is not only unsightly, but without proper thought, you won't be able to utilise the space optimally. In a functional storage space you are able to find exactly what you are looking for and it creates a safer storage environment.

First things first

Consider your current garage and what you would like to achieve with the space going forward. Can some things be stored elsewhere to accommodate additional space for a small workshop or another section you want to include?

Make a date

With spring just around the corner, now is a good time to schedule a day to tackle a garage spring-clean. Plan it for over a weekend and utilise both days to get the job done. If you need to book a skip, do so for delivery on Friday, for pick-up Monday morning. If

you plan to take unwanted items to a municipal dump, check if they are open on weekends and what the closing times are, as well as costs involved. Check the weather and have painter's drop sheets on hand to cover items, if needed

Consider storage

If you know you are going to need additional storage, purchase containers ahead of time, so you'll have everything on hand to get started. Also think about problem areas in the garage – bikes that can be hung up or stored vertically on a wall, tools that can be mounted to a backboard for easy access or vertical shelving, plastic containers or a selection of cardboard boxes to keep items neat and tidy.

Time to tackle the job

- Get started early. Remove as much as possible from the garage – preferably everything!
- Once everything is moved onto the driveway, start grouping items. You will probably need four groups – one for broken items or garbage that needs to be disposed of, things you want to sell online, items you can donate to various charities and items to keep.

- In the 'keep' pile, drill down further by splitting items into sections for camping gear, pool toys, workshop items and tools, gardening equipment, fishing tackle and others categories you have.
- You can also include a fifth pile – items that are awaiting repair. Be strict with yourself. If you want the item and will commit to a date when you will repair it, keep it, if not, rather toss it now.

Clean it out

Before you start moving items back into the garage, give the floor a good sweep and clean with a good heavy-duty cleaner. Walls can be washed down, but if you have time, consider painting the walls while everything is out of the space. If you are going to paint, don't opt for the cheapest PVA paint you can find. Consider a good quality washable paint to facilitate ease of cleaning in the future.

Packing back

Once you have all your groups complete, you will have a clear idea as to what needs to go back into the garage.

- Consider your storage options. If any additional storage containers, shelves or hooks need to be brought, consider this now and what budget you have to put towards it. Simple shelving utilises wall space, not only providing more floor space in the garage, but it's super neat too.
- Create zones in the garage for your categories.
- Pack boxes or plastic containers with grouped items and place them in their new spaces in the garage. Label all boxes or containers.
- For safety, place pesticides, herbicides, insecticides, solvents and other poisonous or flammable liquids that you may store in your garage inside a locked cupboard. ■

PERFECTLY PAINTED

Learn a new paint technique
and give an old bathroom
vanity a complete makeover

>> Catherine Reimers

Paint technique: glazing

The term 'glaze' is used when thinning oil based paint with oil and turpentine. A few layers will provide a beautiful translucent quality and build rich depth.

You will need:

- Eggshell enamel in a shade at least two shades darker than the basecoat
- Boiled linseed oil/oil scumble glaze (this will lengthen the drying time allowing more time to work the glaze over the surface)
- Black universal paint tint
- Turpentine
- Mutton cloth cut into manageable sizes for your hand size
- Good quality 75mm paint brush
- Containers for two shades of glazes, one darker than the other

**MASTER
CLASS**

Paint for the bathroom

A new wall colour can give your bathroom a completely new look. As the room is exposed to moisture, it is important to consider the right paint for this application – paint that provides durability and is washable. For bathroom walls, consider non-drip enamel (oil-based) or good quality washable acrylic paint (water-based) which will allow the surface to be washed without scuffing or scratching. Paint formulated for bathrooms and kitchen includes built-in stain and mildew resistance. Choose an eggshell, satin or semi-gloss finish for a chic, modern look.



Technique and tips

- The basic principle for the glaze mixture: one third paint, one third turpentine and one third oil or scumble glaze. Many paints do have different consistencies, so I would advise that you only add half the oil and turpentine at first. Mix well and see if you have a runny but creamy consistency. The glaze should glide easily but not run down the surface.
- It is best to work small areas at a time, for example one door at a time. Don't try to do half the door as this will leave an unsightly join mark where the paint overlaps. Try not to work too slowly as the paint starts drying as soon as it is applied.
- Apply the glaze with a brush to the door and spread evenly. Using a piece of mutton cloth, folded over softly, gently rub over the surface in a circular motion to blend and soften the glaze to remove brush marks. Dab the cloth very softly with a pouncing action, so that the recesses remain darker. If you have a very soft brush you can soften the surface more by barely touching the paint as you brush over the surface. Once you have completed this step, allow to dry overnight.
- Once dry, pour out some of the mixed glaze into your second container and add a few drops of the black paint tint to darken the glaze even more.
- You can now apply the darker glaze as you did with the first glaze and then leave to dry.
- The next step is to add accents. You can do this by using the darker glaze mixture. Apply to moulded and recessed areas using the 50mm brush. Spread well and then stipple with a dry brush to blend out without losing the depth of colour. Stippling is to apply the paint with a brush and then to soften out brush marks by pouncing downwards with the dry brush. Before the glaze is too dry, wipe down the raised areas so that they remain lighter. Once this is dry you can add the darker glaze with a fine artist's brush to neaten darker, more prominent line work in the vanity. This will give you a beautifully refined finished piece of furniture.



Apply the basecoat



Brush on the glaze



Soften the glaze with a cloth

Stippling is to apply the paint with a brush and then to soften out brush marks by pouncing downwards with the dry brush.



Choosing floor tiles

An old, outdated bathroom floor can ruin the look of your newly painted space. Tiles can transform the floor, leaving it looking clean and modern. A popular décor trend is the use of wood-look tiles for the bathroom floor. They offer the same pattern and depth of colour as traditional wood grain, but packaged as a tile that is waterproof, durable and easy to keep clean. Ceramic and porcelain tiles are two popular types of tiles for bathrooms. Consider mosaics for a shower floor or a basin splash back.

Ceramic tiles

Ceramic tiles are a popular choice for the bathroom or kitchen. They are hard-wearing and easy to clean, both properties which make them a popular choice for these areas. Ceramic tiles are suitable for work tops, floors or walls.

Porcelain tiles

Porcelain tiles are also ceramic tiles, but the clay used to produce porcelain tiles is denser and the tiles are baked at higher temperatures for a longer time period. The extended drying period makes the tile harder and denser, with a low water absorption rate (less than 0.5%). Porcelain tiles are easy to clean and less unlikely to stain. They can be used for floor or wall tiles. One of the biggest advantages of porcelain tiles is their extreme durability and high quality, making them suitable for any area in your home that takes extra traffic.

After having the couch in the bathroom re-upholstered, the existing painted vanity looked rather drab and in need of a fresh makeover. So the next step was to give it a new look - with just a little paint.

Prepare the vanity

Step 1: Give the vanity a good clean to get rid of any dust and grime before sanding. If there is still grime on the surface, it will clog the sandpaper.

Step 2: Using the 120-grit sandpaper, sand down the surface thoroughly. This will create a key for the primer to adhere to. Remove the dust from the surface and you can now begin to paint.

Step 3: Apply the primer using a sponge roller on the flat surfaces and a brush for all the moulded or recessed areas. Be careful not to have excess paint going over the edges and watch for runs or drips.

Step 4: Ensure that the primer coat is completely dry before using the 180-grit sandpaper to sand the primer to a smooth even surface.

Step 5: Dust the surface again before beginning with the basecoat.

Step 6: For any paint technique it is very important to have a very well prepared basecoat with complete coverage. The glaze for the technique has translucent qualities and will only emphasise any imperfections in the basecoat. For the basecoat, I chose a soft blue in Plascon's Velvetro, non-drip enamel. This will give a great base for the technique glaze, which will also be oil-based. If you decide to go with water-based basecoat, chose a paint that will offer a satin finish, as this helps the glaze to glide over the surface more smoothly and will help to give a more refined finish. If you use a matt acrylic, the glaze can be absorbed leaving ugly patches on the surface.

Step 7: Always remember to sand lightly between coats, but do not sand

the final coat. You will need to apply at least two or three coats. The basecoat can also be applied with a brush and sponge roller. Once again keep an eye on drips and overruns. Once this is completely dry (for enamel paints, leave overnight to dry thoroughly).

Step 8: Now that the vanity is prepped and dry, you are ready to mix the glaze for the paint technique. (See the box 'Paint technique: glazing').

Step 9: Once the glazing technique is complete, it's time to apply a sealer. Sealing the surface is very important as there is moisture in a bathroom and varnishing will protect the paint technique as well as prolong the life of the furniture. To seal the surface, apply a hardwearing water-resistant solvent based varnish in two coats. Make sure that you use a good quality paintbrush that won't lose hairs. The first coat can be thinned with turpentine by 10%. Once dry, sand lightly with a very fine paper and apply a second and even a third coat of varnish. ■

Tools and materials

To prepare the vanity you will need:

- Drop sheets
- 180 and 120-grit sandpaper
- Universal undercoat/water-based all-purpose primer
- Turpentine
- Sponge roller
- 75mm and 50mm good quality brushes
- Non-drip enamel/eggshell enamel for the basecoat

BRIGHT IDEAS

Readers share their time-saving, space-saving or innovative ideas

Size a spanner



How many times do you need a spanner and the size is just too big for the job? Next time when you need to remove a nut and the only open-end spanner you have is too large for it, simply insert a coin or washer between the spanner and the nut. The gap will be filled and you will be able to turn the nut without any problems.

André Gous

Perfect parking

Measuring distance in your garage can be tricky. One way of solving the problem is to park the car in the perfect position. Then, suspend a soft item like a tennis ball or, as in this case, a champagne cork, from the ceiling so that it just touches the windscreen. No more worries about scratching the bumper. An adjunct to this idea is to stick blind spot mirrors on the walls of the garage to allow you to easily see any potential obstacles.

Clifford Roberts



Broken pot lid



A broken lid handle often means that a pot must be thrown out. My father-in-law came up with this nifty trick when the lid handle on

one of his pots broke. He simply drilled a short hole into an old golf ball and, using the screw already present in the lid, fixed the ball in place. It was meant to be a temporary fix, but has been in place and has stood the test of time.

Clifford Roberts

Two handy tips

To prevent drilling too deep, hold/measure the plug/screw up against drill bit. Mark the length with Tippex on the drill bit. Only drill until you reach the white mark, and you will have drilled the hole at the correct depth.

For conveniently storing cables - fold cables up and then insert into a toilet roll cardboard inner. Keeps them neat and from becoming entangled.

Darryl Roberts

Burn protection

It's terrible when a hot pot burns a ring into your kitchen countertop or worse - cracks it due to the difference in temperature. These wooden planks solve the problem beautifully, plus they make great gifts. Simply take two small pieces of wood about 20cm in length. Cut a recess midway in each so that they fit snugly, providing a flat surface on which to rest a pot. Remember to sand them and finish off neatly to make a good impression.

Clifford Roberts



Share your ideas!



WIN A Tork Craft Mini Rotary Tool with 72-pc Accessory Kit and Flexible Shaft from Vermont Sales



Send your bright ideas to: editorial@homehandyman.co.za with 'Bright Ideas' in the subject line or PO Box 24938, Gezina, 0031

Please include your name, physical address and a contact number (office hours). You may also include a photograph (300kb) of your bright idea (where applicable).

Please note: Winners' prizes may take up to six weeks for delivery and are sent by the prize sponsor. Prizes are not exchangeable.

Savvy sensor

Build a super microwave movement sensor that is able to detect movement through ceiling boards, plastic cases and even wood

>> Kin Le Roux

Materials required

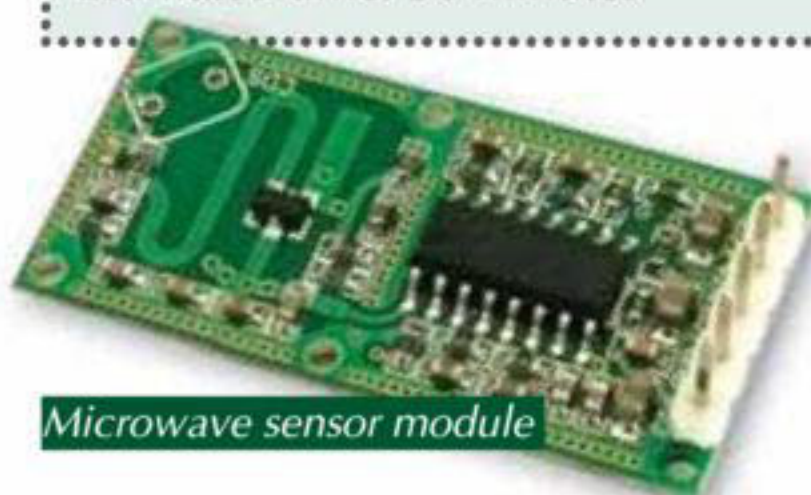
- One 5V power supply (an old cell phone charger is perfect)
- One microwave sensor module
- One relay module
- One LDR (light sensitive diode)
- Thin cables (male to female and female to male cables - see the completed project image).

Project guide

Difficulty: Easy

Estimated cost: R120

Estimated time: 30 minutes



Microwave sensor module

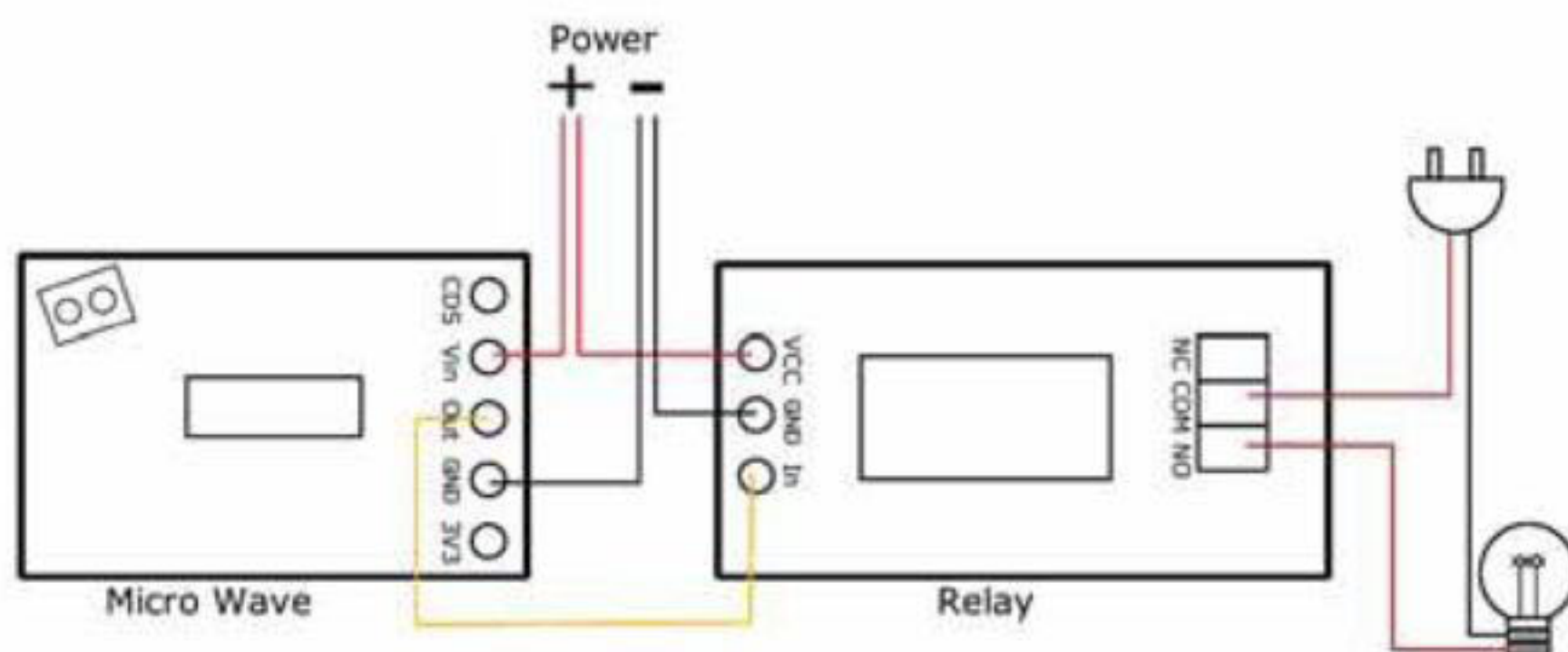
If you're keen to get started in electronics, this motion sensor project could be just the right starting place for you. The project allows you to create a type of 'cause and effect'. Once motion is detected, you decide what happens next. For example, as soon as motion is detected, outdoor or indoor lights turn on, a buzzer sounds or your alarm goes off. The sensor is able to detect movement through ceiling boards, plastic cases and wood. It works with true motion, not heat, like the general alarm sensors that are used in most homes.

Once complete, you place the unit inside your roof and out of sight and the radar waves easily move through the ceiling boards. With a small modification, you can hook up the sensor to your alarm system too. Next, you can add light control, switching lights on and off automatically. This super motion sensor detects intrusion in a room, or even inside your roof cavity.

This unit is a straightforward one to work with. You can connect a relay directly to the board to switch high voltage appliances and lights on, using up to 240V. (See warning at Step 3). Think of the relay as an electronic switch. By supplying low volts it will switch on either low or high voltage equipment. The movement sensor can provide low voltage to a relay that in turn will switch on equipment.

Step 1: Connect the power to your sensor and relay board first. Do not plug the power in the mains yet. The simplest method is to cut the plug off the 5V power supply cable and to connect the power wires to two female wires on the positive power supply wire (red wire) and another two female cables to the negative power supply wire (black wire). Note from the images and diagram – you just plug the wires into the boards.

Both boards have descriptions on them so you will know exactly where the

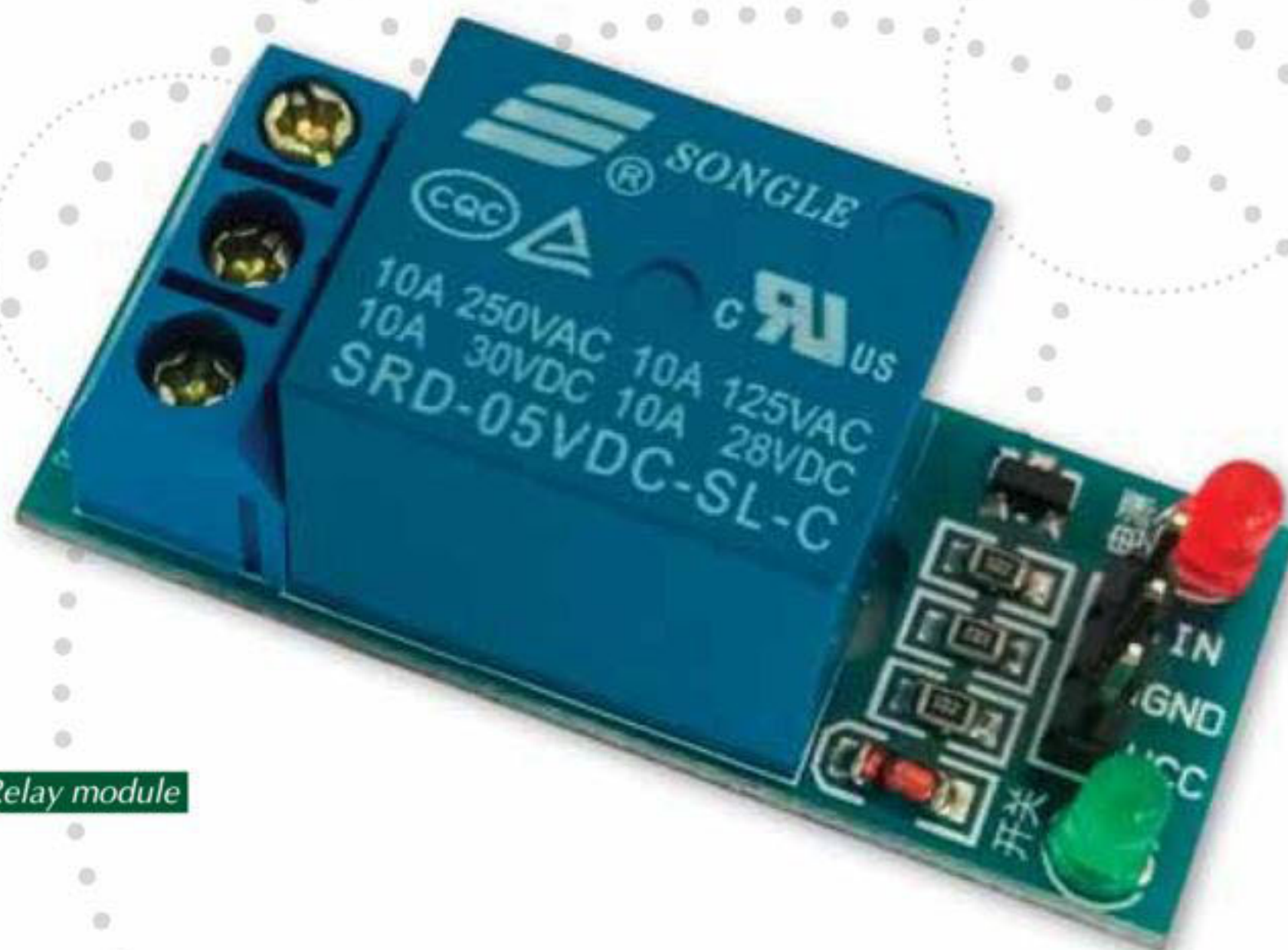


power connects. The negative wire is plugged into the pin marked GND and the positive wire is connected into the pin marked VCC or VIN.

Step 2: In the diagram, you can see the yellow wire connecting the movement sensor pin (marked “Out”) and relay module pin (marked “In”). When movement is detected, it will supply 5V to the relay board. As soon as the relay receives 5V, it will switch the relay.

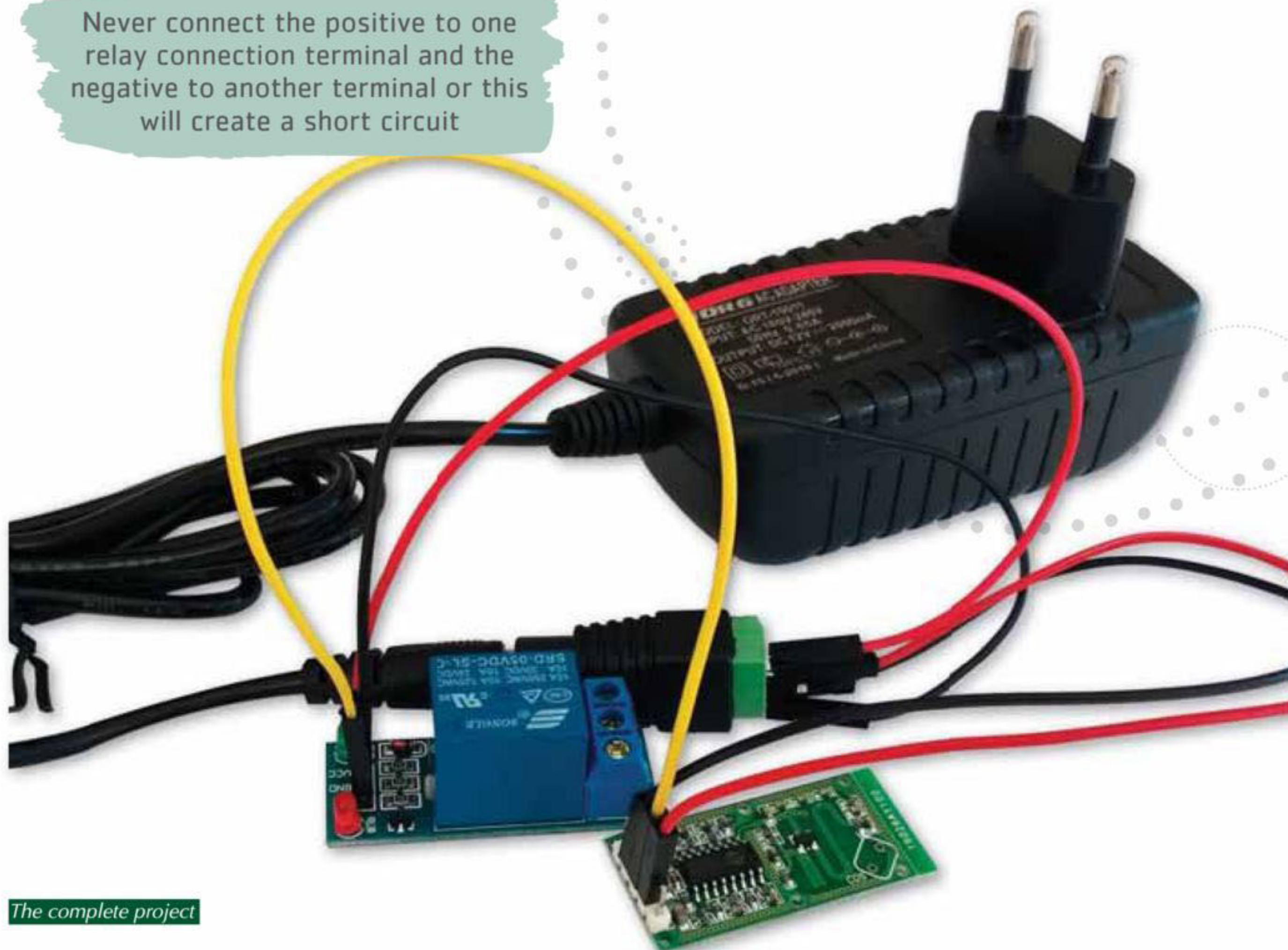
Step 3: You can connect low power lights like 12V LED lights without danger to yourself with a relay. Warning: it is dangerous to connect high voltage equipment like 220V to relays. This is enough power to kill you!

Connecting equipment or lights to the relay is done from the three terminal blocks. Inside the relay is a coil that acts as a magnet when it receives 5V. The magnet will pull a mechanical lever from one position to another inside the relay. There are three connectors for relay switching. The first is the lever, called COM (for common) and this is where you connect your incoming wire. Next are the N/C (normal close) and N/O (normal open) connection points. Without the 5V supply to the coil the lever is in contact with the N/C connection point, meaning power can flow between the COM and N/O terminals. This is the same effect you get with a light switch, the only difference is that we use an electric way to switch the power. When you supply power to



Relay module

Never connect the positive to one relay connection terminal and the negative to another terminal or this will create a short circuit



The complete project

the coil the lever is pulled to the N/C connection point, and now the lever is in contact with the N/C connection point and power can flow between COM and N/O but not between COM and N/C.

Why does this have three terminals? It allows you to connect equipment in two different ways. By connecting one power wire to COM and N/C the equipment

will be switched on when the relay does not have any voltage over the magnetic coil. It will be switched off when there is power over the coil. On the other hand, if you want equipment to be switched off when the relay is not powered, and on when powered you will use COM and N/O terminals.

Never connect the positive to one relay connection terminal and the negative

to another terminal or this will create a short circuit. This is the same as when you touch the positive and negative wires together. Either take the positive or negative wire and cut it, place the one end of the cut wire in the COM terminal connector and the other end of the cut wire in either the N/C or N/O terminal connection.

Coming up

In the next issue we add more functionality to this project by making an adjustable delay timer so you can control how long the relay stays open. This controls the duration of the lights. ▣

RESOURCES

All parts used in this project and upcoming projects are available for purchase from Bot Shop – www.botshop.co.za



Power wires connected





Boskoors Adventure Camp

09 - 15 December 2018

We at BosKoors are inviting all avid young anglers between the ages of 7-16 years to join us for loads of fun and adventure.

Venue: Boskoors Farm, 30km North of Pretoria on the Moloto Road.

Bookings are essential!

We have limited spots available as we like to keep the number of campers at a minimum, to ensure that every child gets the necessary individual attention and guidance.

Please call Wilma on 065 849 3264 or 083 306 2718 to book your spot. For more information visit www.sabass.com or e-mail wilma@sabass.com



Clocks made from contrasting woods

His 'hands-on, make a plan' attitude has contributed to Ronnie Searle being a successful, respected woodworker and clockmaker today. He works out of the garage of the home he moved into 39 years ago.

Getting started

In an effort to avoid boredom when he first retired, Ronnie Googled 'What people do in their garage in America'. He set his heart on designing, cutting and assembling wood items. He purchased a second-hand wood cutting machine and the Vectric Aspire software and has not looked back since.

Drawing on his years of self-taught computer knowledge, he quickly became brilliant at designing beautiful woodwork and then successfully producing very neat, top quality toys, clocks, jewellery boxes, decorative figures, confectionery boxes, bird nesting boxes and interlocking photo frames. His latest challenge is making an Aurora, a kinetic wall sculpture that rotates continually forming moving eye catching patterns. This large eye-catching feature rotates continuously, fascinating one with its mesmerising pattern movements.

Perfecting projects

While he is quick to add that he is not a chair or cabinet maker, Ronnie spends countless hours creating beautiful woodwork pieces. His wife, Val, keeps herself occupied designing fairy gardens that she uses to decorate the tables she hosts to raise funds for CANSA at 'Tea on the Terrace' functions and serving her husband coffee in his workshop.

Ronnie pays special attention to the detail on each toy and aims to make it more realistic, right down to the wheel nuts on self-designed and crafted wheels. Ronnie says that wheels are deemed to be 'the worst' to make and many crafters usually purchase these. His toy trucks sport realistic looking aluminium plates and he customises and personalises designs on any chosen wood gift. He believes in doing something until you get it right.

Hands-on to high tech

>> Kim Roberts

Former diesel mechanic, Ronnie Searle of Empangeni, is a woodwork hobbyist with his own CNC machine

Ronnie feels that a good basic knowledge of woodwork and technical know-how, along with computer experience are what it takes to excel in the hobby. The CNC machine Ronnie uses measures down to micro millimetres and works in micro seconds. The settings are very important to obtain the desired result. You have to know your machine and be able to do maintenance on this very expensive wood cutter. Each machine has its own monitor, and enterprising Ronnie has even set up a camera on his large machine in order to remotely keep an eye on the cutting progress, even while he is inside the house enjoying his lunch!

Ronnie's first project, a wall clock, was made from discarded kitchen cupboard doors. He does not use soft pine wood as it chips and breaks. Harder wood and plywood are perfect. He chooses the type of wood according to the purpose of the finished item. A strong, but light weight wood is suitable for toys.

Planning and process

Once wood is chosen for an idea, it is cleaned and planed. Ronnie then creates the design on the machine, sets it to run and then glues and joins together the separately machined pieces. Sometimes wood glue is used to join different wood pieces together for a specific project. Some projects have many pieces that make up the final product. For clocks, the inserts (face and hands) are added in at the final step of manufacture. For 3-D carving effects a V-bit is used. The V-bit size determines the depth and size of the image carved out.

Recently, Ronnie and his nine-year-old granddaughter created and completed

a toy together while she visited on holiday. The little girl loved being part of the creativity as she learned more about the toy-making process. The added bonus – she got to keep the her special toy! Although he would love to pass his knowledge on to the family's next generation, he unfortunately cannot, as his children and grandchildren no longer live in the area.

Ronnie sells his articles at local flea markets and on Facebook. When customers comment on the beauty of his wares, and ask how he achieves some of his intricate, exact designs with countless holes, he answers mischievously. With a serious face, he says that he patiently sits with a hammer and screwdriver to fashion each identical hole!

Taking on a challenge

Ronnie isn't afraid of a challenge. He bought a rusted, scrapped metal lathe, dismantled it, cleaned it, machined a missing metal part, then-assembled it. Today he uses it constantly.

When someone brought Ronnie a challenge - to fix a broken section of a car dashboard, he threw himself into the task. Painstakingly, he measured and designed the air vent fins and produced the perfect section to repair the car.

Another challenge he recalls is a large paper cutter base that was weather-damaged. He had to design a furrow for the blade to operate in. He discarded the swollen damaged part and replaced it with his machined part and it is in excellent working order again. 📷

Photography: Darryl Roberts



The first clock Ronnie made from discarded kitchen cupboards

Ronnie's top tips

We asked Ronnie Searle to share some of the characteristics and tips needed for successful woodworking with computerised equipment.

1. Time and patience

"To get the end result, you have to painstakingly work with measurements and careful design. Holes must be lined up to the millimetre."

2. Never throw scrap wood away

"Scrap wood can be joined and used in another project to give beautiful effects. Customers tend to like the contrast in wood colours."

3. Make your own jigs

"To make sure a project is straight, design and create your own jigs to line the parts up to glue together for that perfect finish."



Aurora pieces – all precisely the same



Ronnie at his CNC machine

FAMILY
PROJECT

Get the *Googly-eye
Toothbrush Robot* kit online
at www.botshop.co.za

Mini bot



Recycle an old toothbrush and help your child build the *Googly-eye Toothbrush Robot*, a fun robotic project designed to spark interest in this fascinating field

>> Cindy Le Roux

The *Googly-eye Toothbrush Robot* is a fun project for parents to tackle with their young DIY'ers. I cannot think of a more basic robot to build and this is a perfect project for children to get started in robotics. You might just spark some interest and your child could be the world's next super robot designer! The project also utilises an old toothbrush, reinforcing the concept of recycling various items to build fun and interesting things.

The project makes use of a small vibrating motor that will make the toothbrush head move and spin in circles. To make it

fun and give it character, we've added some googly eyes. The small motor uses very little power and can run from a small 3V battery. Do not use a battery that is higher than 5V as it can damage the motor.

A vibrating motor works the same as a regular motor, but the motor shaft has a piece of metal on the front that sets it off balance. When a motor is off-balance it vibrates when it spins. The effect is similar to that of a washing machine when all the washing is on one side in the washing machine and it makes the washing machine rattle and shake loudly.

Step-by-step - a toothbrush robot

Let's build the *Googly-eye Toothbrush Robot*. Make multiple robots and see if you can get them to race or jiggle in a group. It's super fun to watch!

Note: we've provided these steps for your child to follow, but for safety reasons, always assist your child with any project.

Step 1: Ask an adult to assist you in cutting off the toothbrush head using a sharp pair of scissors, or a knife.

Step 2: First, we secure the vibrating motor on the toothbrush. Use a rubber band to keep the vibrating motor in place. In the past, we used double-sided tape but we noticed that the double-sided tape absorbed some of the vibrations. The toothbrush moves better without it. Make sure that the red and black wires on the vibrating motor don't touch each other. If you follow the steps carefully, this won't happen.

Step 3: We now need to secure one of the stripped motor wires to the battery. The easiest way to do this is to put a rubber band around the battery. Wind the stripped wire around the rubber band so it cannot come loose. Wrap the rubber band (with the wire in place) around the battery so the bottom of the battery makes contact with the stripped wire.

Step 4: Wrap another elastic band around the battery and toothbrush to keep it in place on the toothbrush. Now you can test the robot. Once you connect the second motor wire to the battery, the motor will start to vibrate, but you can now do a quick test to see if the motor works correctly. Connect the second wire to the battery's top side by sliding it below the rubber band on the top of the battery. If it doesn't work, the bottom wire may not be making contact with the battery. Once it works, you can pull the top wire from underneath the rubber band and move to the next step.

Good to know – it doesn't matter which way around the wires are connected to the battery. The only difference will be the direction the vibrating motor will move. This is because the motor is only used for vibration and it does not matter if it spins clock- or anti-clockwise.

Step 5: It is time to make your project look more like a robot. Add your googly eyes to give your robot some character. You can glue it on the battery or use Prestik.

Step 6: Put back the wire you disconnected in step 4 after testing. Put the mini robot on a flat surface and see how your little robot moves and turns. If your robot falls over too easily, check if the vibrating motor and battery are centred in the middle of the toothbrush.

Bright tip: don't stop at the toothbrush head! Try connecting the little motor to other objects around the house too. 📌



Project guide

Difficulty: Easy

Estimated cost: R40 (excl. toothbrush)

Estimated time: 10 to 15 minutes

Materials required

- An old toothbrush
- Vibrating motor
- Battery
- Rubber bands
- Two googly eyes
- Glue or Prestik

RESOURCE

Project by Bot Shop – www.botshop.co.za



Cut off the toothbrush head



Secure the vibrating motor



Secure one of the motor wires to the battery



Use another rubber band to keep the battery in place



Add your googly eyes



Reconnect the wires

ASK OUR EXPERTS

Our panel of experts answer your questions on DIY problems

Preserve an old door

WINNER

I was gifted an old door that is weathered from standing outside. It was painted turquoise and the paint is peeling and the door has an old, rustic look about it. I want to preserve the peeling paint as is. Can I just spray a sealant on this? I don't think I can paint it on as this will pull off the peeling paint. Do you think I can preserve this look?

Keely Phillips, Website query



Adam Rayner of Heritage Craft Products responds: I would not advise the use of a normal aerosol spray as the solvents might not be compatible with the peeling paint and the lacquer is not the best on an outdoor wood and paint situation. Rather use the Outdoor Podge as it is a water based formulation that will not react badly with the old paint and will be weatherproof. Water down a bit in a spritzer bottle so you can spray about three layers onto the peeling paint. Then apply some Outdoor Podge with a soft brush to fully seal the door. For other readers, if you want to achieve a peeling paint look, try our Kwick Crack product. The Kwick Crack can be used with our acrylic paints as well as the very popular Chalky Paint Range.

Boundary wall options

WINNER

I need to replace an old precast boundary wall, but after having a quintuplet heart bypass surgery, I need help with the project. Should I consider blocks, cement blocks or just normal clay bricks? I am also worried about the fly-by-night con-artists out there. Cost involved and durability are my main objectives.

Christo Vermaak, Website query

Gordon Alexander, director at BuildAid replies:

In order to avoid fly-by-nights and calculate costs properly the reader must specify what is required:

1. Height of the wall.
2. Thickness of the wall and any piers.
3. Is the wall plastered and what finish?
4. Is the wall painted and with what paint?
5. Site conditions with regard digging and casting foundations e.g. trees, slope, existing foundations.
6. Must the contractor remove the existing precast wall?

The difference in price between concrete bricks and clay bricks depends on geographical location but concrete bricks tend to be a bit cheaper. Blocks can be cost effective but it depends on the type and size of block. Depending on the size, height and location of the wall, it may need to be approved by the local council which means appointing and architectural professional and submitting plans.



WIN

2 décor and craft paint gift hampers from A.Shak

valued at R550 each

Send us your DIY queries and you could be a winner!

Send your queries to:

The Home Handyman DIY Queries
editorial@homehandyman.co.za or
P.O. Box 24938, Gezina, 0031

Please include your name, physical address and contact number (office hours)

Please note: Queries will only be answered in the magazine. Winners' prizes may take up to six weeks for delivery and are sent by the prize sponsor. Prizes are not exchangeable.



Our winning queries come from Christo Vermaak & Keeley Philips. They both win plumbing gift hampers from A.Shak.

Building plans

I had a small sunroom added to an existing patio on top of my garage. No wet work was done – the structure is made of aluminium and glass and used the existing side walls as anchor points. I've been told by the body corporate of our complex that approved building plans were required for this structure. The company who did the installation said nothing about plans. Is this true and what is my recourse?

Ernie Bailey of Edenglen

Kobus Burger of KMI Draughting

responds: Yes, plans would be required to be submitted to and approved by your local municipality. Unfortunately, the responsibility is on the owner of the property to ensure any building work internal or external, if plans are required or not, to be submitted and approved by the local authority.

The National Building Regulations and Building Standards Act, 1977 (Act 103 OF 1977) has many rigorous stipulations that must be adhered to which is stipulated in the SANS 10400 (South African National Standards) Part A – W and various other SANS regulations depending on the building or installation. To quote: "Habitable room" means a room used or designed, erected, adapted or intended to be used by persons for sleeping in, living in - the gathering together of persons or for recreational purposes.

Adding a sunroom, usually with glass, is a type of building extension, which is a habitable room, used for recreational purposes. The main focus is "habitable room".

The actions which can be taken: (1) to remove the sunroom, but I will presume this is not an acceptable option and (2), contact a SACAP registered architectural person to update your plans and submit to the municipality for approval.

If in doubt about any additions, alterations, building or structures, contact a registered architectural person for guidance.



Toddler room



I am changing my baby's nursery into a toddler bedroom that I would like him to remain in until at least primary school. With regards, to colour choices, what should I consider or avoid? I want to create a fun space but I also want it to be restful.

Jessica Johns of Marlands

Colour consultant Helen Gurura

responds: Certain factors are known to influence and play a pivotal part in the colour selection process. An awareness and understanding of their role and effects will greatly assist in narrowing down the colour palette to perfection.

These variables include, amongst others, the toddler's own personality and their observable relationship with colour, the room's size, shape, its architectural style, the quality and quantity of natural and artificial light/lighting, colours of existing fixed fittings (carpets, tiles, built-in

cupboards etc.), colours of new furnishings and décor accessories and others. The latter aspects are of importance as colour is never seen in isolation, but in combination with those that surround it. Colour harmony is of importance in creating an appealing décor aesthetic that is pleasing to the eye.

Keep in mind the general colour basics:

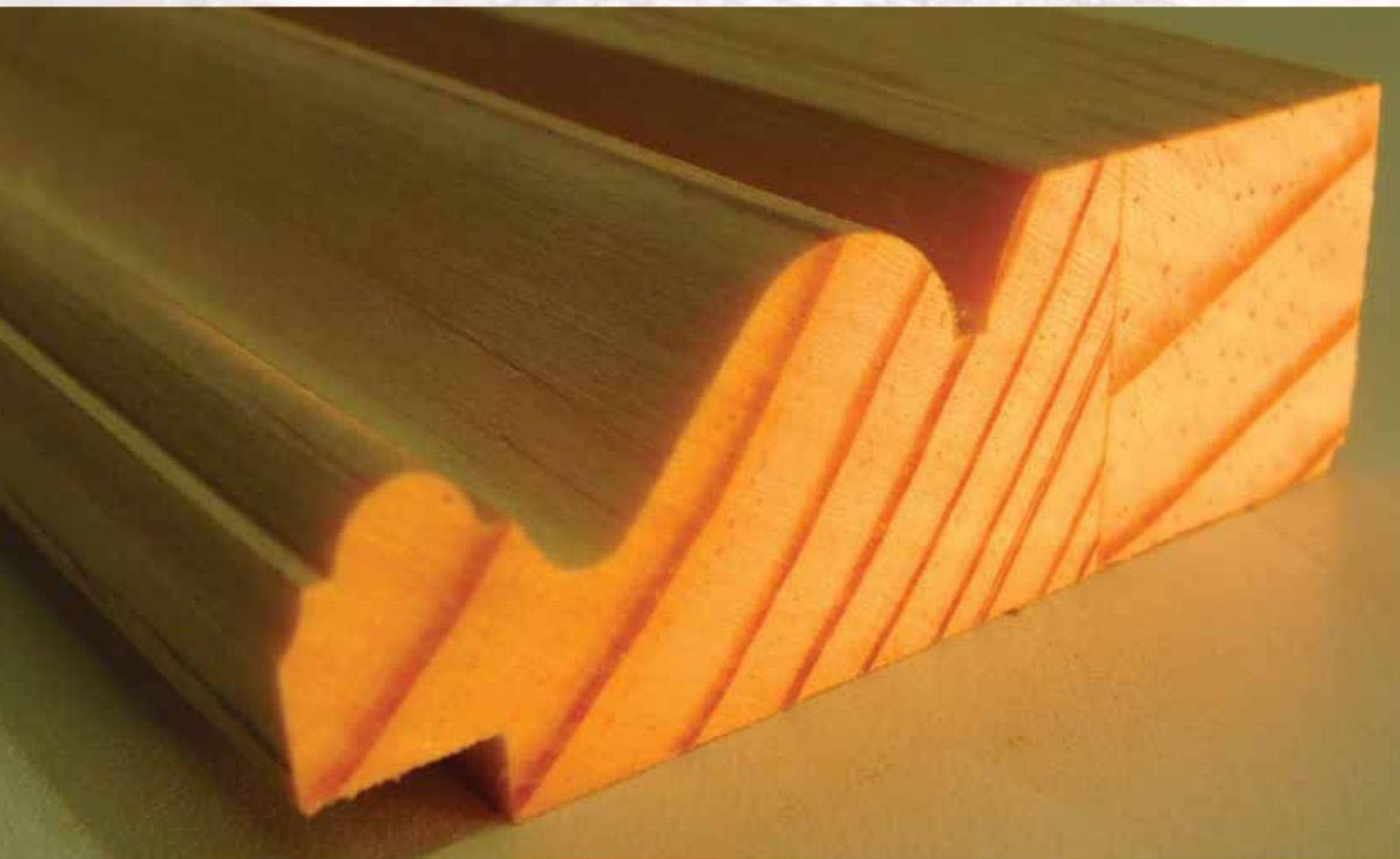
- Dark colours can make spaces appear smaller optically, whilst light colours have the opposite 'opening up' effect.
- Used unsparingly, intensely bright and bold colours are renowned for creating visually straining and over-stimulating environments, whilst the monotony of pale colours has a tendency to create under-stimulated spaces. It is advisable to avoid extremities and the selection of mid-tone pastels, in subtle, calming and soothing hue-types, will aid in creating the desired 'restful' mood effects being sought. On specific, traditional boys' or gender-neutral colours can be considered.

- To incorporate an ambiance of fun and playfulness, vibrant brights can be brought in moderation through accent walls, soft furnishings, toys and décor accessories.
- Where space and architectural style permits, the bedroom can be subtly separated into 'rest' and 'play' areas... thereby enabling one to creatively employ the above recommendations in demarcating and differentiating the two zones.
- Where paint is being applied, it is always advisable to sample the chosen hues on the walls prior to purchase. Colour adjustments and/or changes can be made accordingly.



Moulded edges (Part 2)

Denis Lock continues his discussion on moulded edges



>> Denis Lock*

The article in the last issue concentrated on the router bits used to mould (shape, profile) the arises of wooden project components. It was briefly stated that the moulding could be done using a hand-held router or a router table. Those woodworkers who have used a hand-held router know that it is an inherently unstable machine and that tipping the router is a real possibility. This instability results from the fact that at most of the time less than half the base is supported by the workpiece. When routing around ninety degree corners less than a quarter of the base is supported. In other words the centre of gravity is over fresh air not over a solid support.

In some cases tipping the router is unforgiving and the piece of wood being routed is ruined and has to be replaced. In other cases it is forgiving. The tipping leaves a lump that can be removed by a second pass. Profile routing with bearing-guided bits falls into the second category. This is because the router, when tipped, pivots on the bearing moving the cutter away from the work and leaves a lump. Get into the habit of running your fingertips over the routed profile when you have completed the cut. If you feel a lump(s) make a second pass immediately. You don't want to have come back at a later stage and have to set the router up to exactly match the original router setup.

I prefer to stabilise the router by adding a balancing block to the router base as seen in photo 1. This block is the same thickness (use an offcut) as the work being routed. I can now concentrate on keeping the bearing in contact with the edge of the piece of wood being routed and on moving the router smoothly. Pauses in the movement of the router must be avoided: these inevitably end up in burn marks.

A router table solves the problem of instability. If you have a router table cut most of your moulding on this machine. This is what I do. The exceptions are large pieces such a table top. This is

what I am routing in photo 1. This top is too unwieldy to handle safely on a router table. There is, however, nothing wrong with hand-held routing. Don't change the router table setup to rout one or two pieces. Do them with a hand-held router.

I think a router table is inherently more dangerous than a hand-held router: a sharp tungsten carbide bit spinning at high speed sticking up in the air. I always use a shop-made bit guard. Photo 2 shows top and bottom views of this safety device. It serves three purposes: a bit guard, a way of attaching a vacuum hose and a starting fulcrum (photo 3). What I have labelled SF (starting fulcrum) serves the same purpose as a starting pin on a commercial router table.

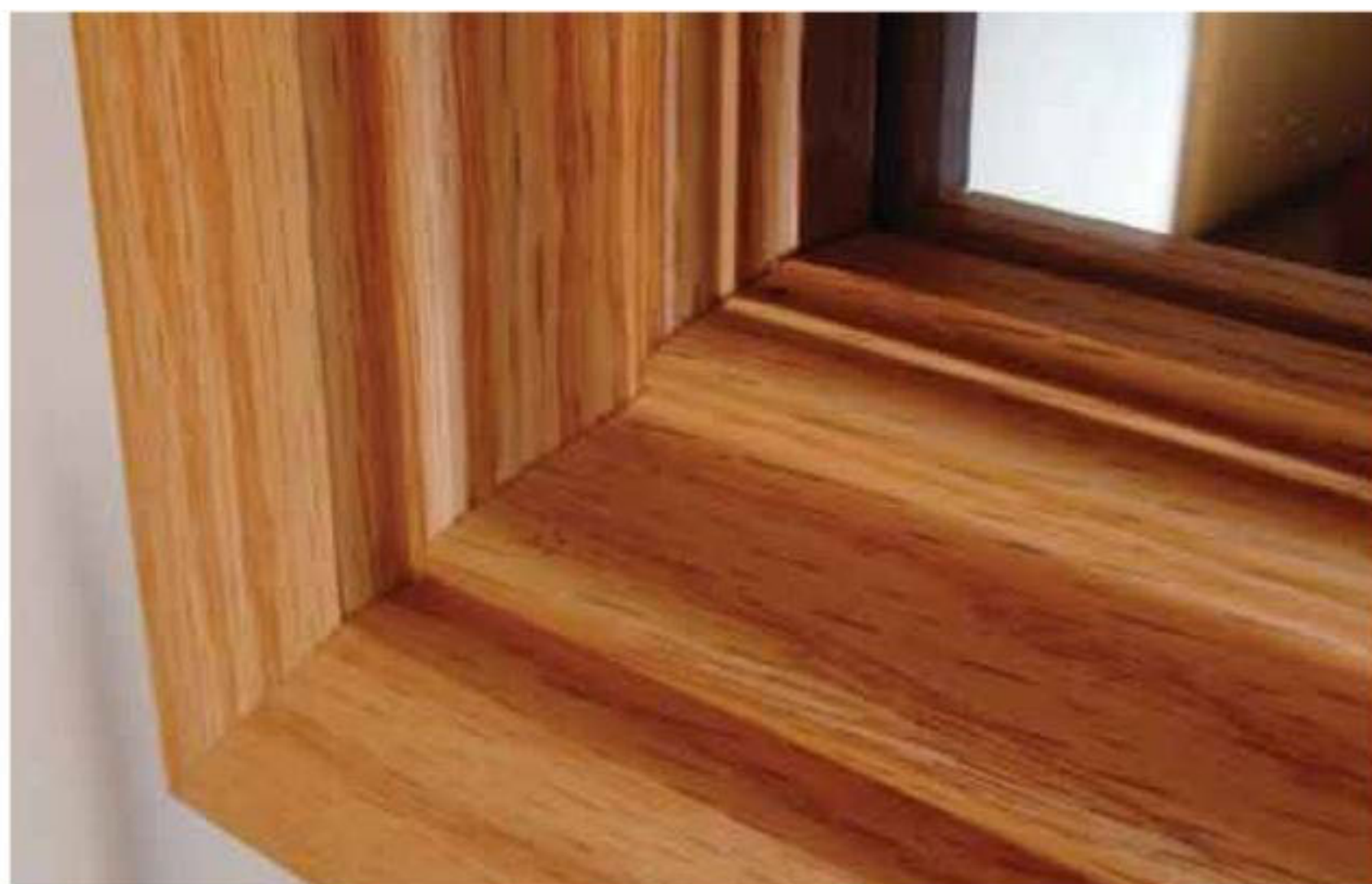
Start your router and brace the workpiece against the starting fulcrum. Pivot the starting corner of it firmly and smoothly toward the cutter. Keep your work pressed against the starting fulcrum as the edge of your workpiece comes into contact with the bit's bearing. Ease your workpiece away from the starting fulcrum as the bearing takes over, feeding the raw edge into the bit in a right-to-left motion, as shown in photo 3.

Often the moulding being done is on straight pieces only. Use the router table fence to guide the piece of wood

being moulded. Adjust the fence so that a steel rule rubbed against the fence just "kisses" the bearing (photo 4). There are a number of advantages to using the router table's fence instead of the bearings on the bit to guide the work. The sideways pressure is taken off the router bit bearing and the motor bearings and is transferred via the fence to the router table. The start and end of the cut is much easier and the chance of kickback is eliminated. The bearing cannot score soft wood and if the cutter is badly ground the ridge that would result can be avoided by a slight adjustment of the fence.

Three lessons

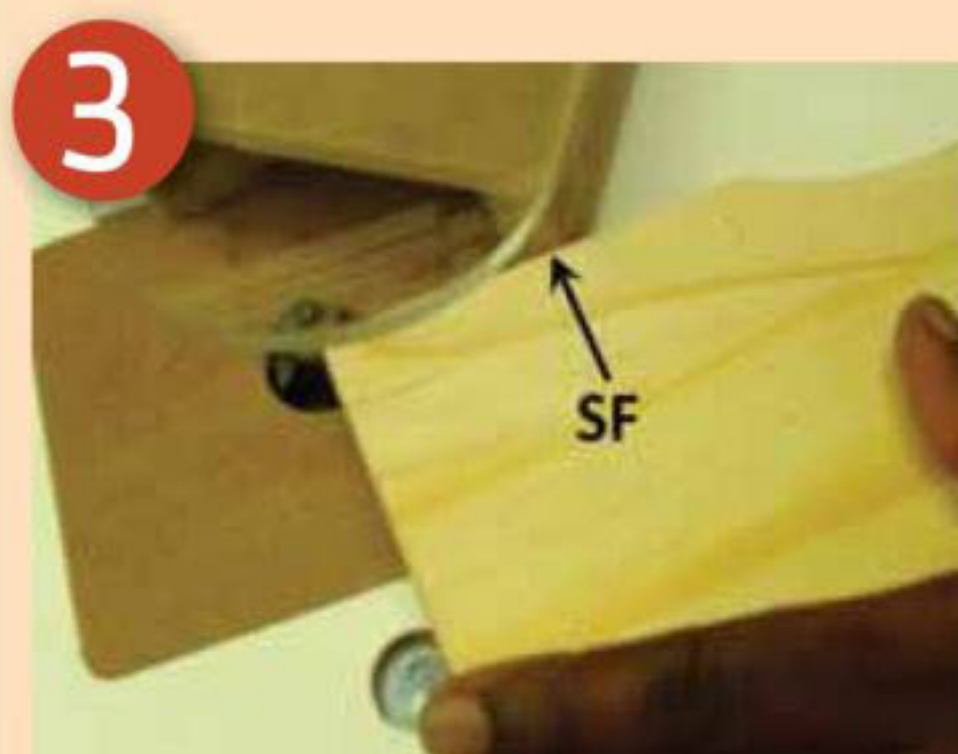
You don't have to buy a large number of profile bits in order to cut a variety of mouldings. Students on my routing courses learn three important lessons about profile bits. The first is "Play with the height/depth of the router bit." Height of course refers to table routing and depth to hand-held routing. Photo 5 shows how three different settings on the height/depth of a round-over bit result in three different profiles. The first is a partial round-over. The second is a complete round-over and the third is a round-over plus quirk. Have a look at your Roman ogee bit and cove bit (photo 6): play with the depth!



Stabilising a router



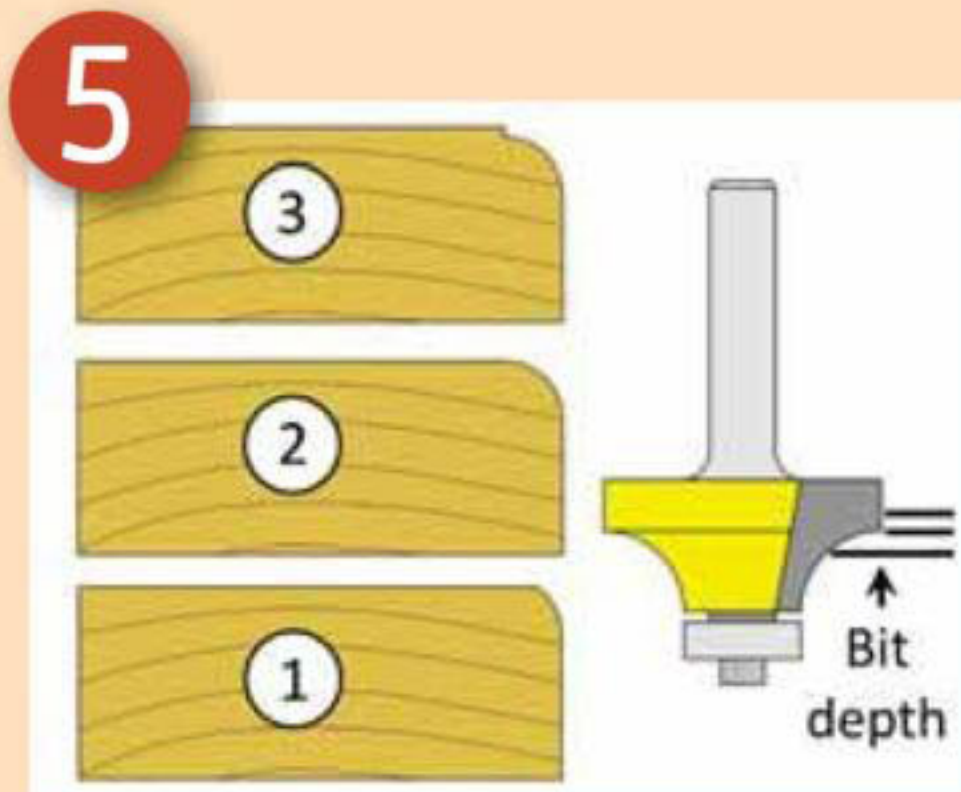
Bit guard



Using the starting fulcrum



Fence adjustment



Play with the depth: round-over



Play with the depth: ogee and cove



Lesson 1: multiple cuts



Prototype crown moulding



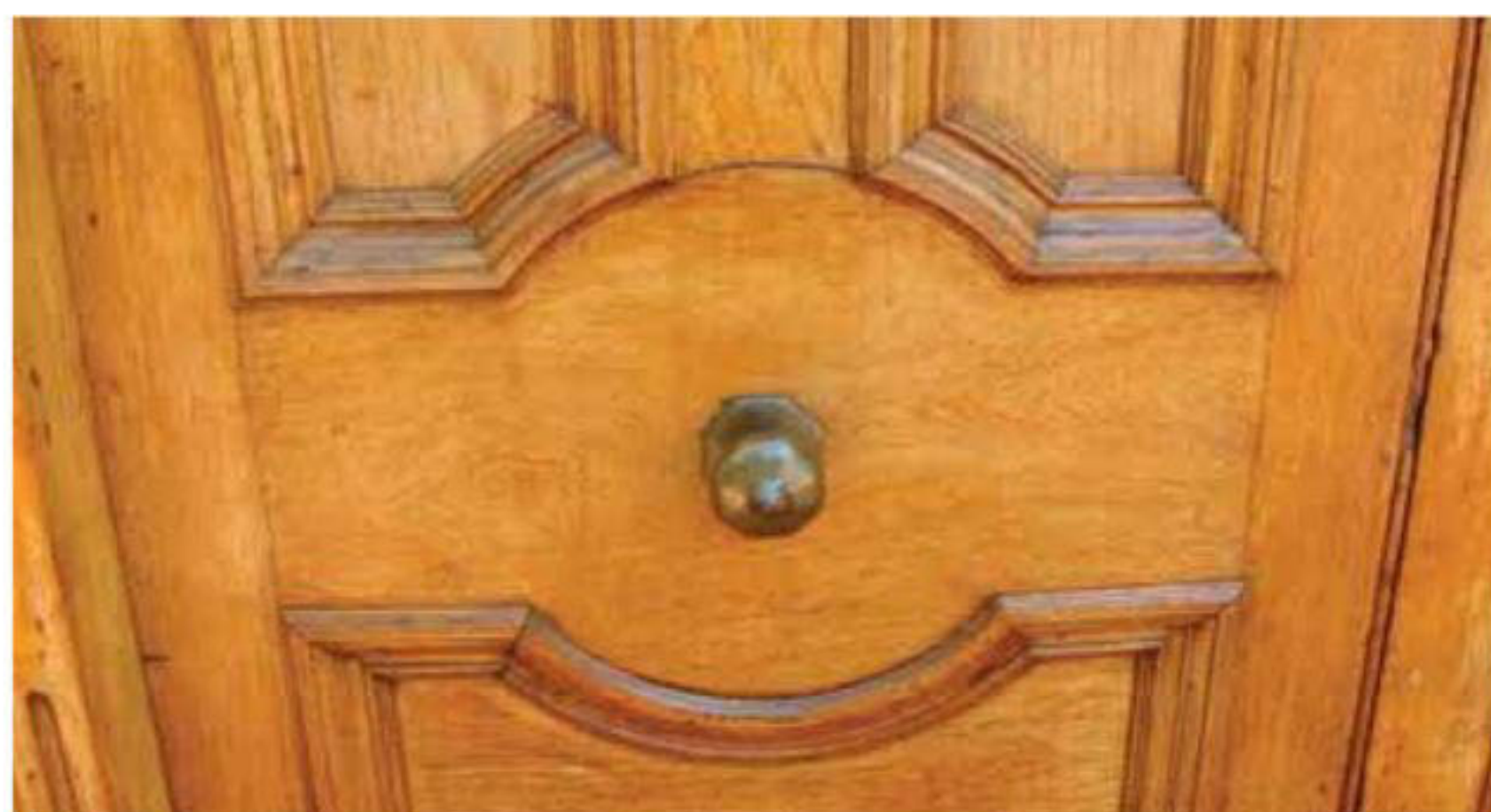
The second lesson is “Make multiple cuts – with the same bit or different bit – on the same piece of wood.” Photo 7 shows eleven different profiles. These, and six others not shown, were cut using only three bits. The three bits are: $\frac{1}{4}$ ” (6,3mm) round-over, $\frac{1}{2}$ ” (12,7mm) round-over and $\frac{1}{2}$ ” (12,7mm) diameter core-box bit. Some profiles were cut using one bit only, some with two and some using all three.

The third lesson is: “Build up a larger moulding from multiple pieces of wood.” Photo 8 is a prototype (in pine) for the crown moulding for a wall unit. It consists of three separately moulded pieces of wood plus two 12mm x 6mm splines that aid assembly. Photo 9 shows the finished crown moulding in sapele mahogany. This is quite a complex

construction. Three mouldings: one vertical, one horizontal and one at an angle are used.

More generally two or three mouldings are stacked horizontally. Look at existing cabinets to get ideas or design your own. Experiment with paper templates that mirror the shape of the profile bits you have. I generally use three bits for built-up mouldings: a $\frac{1}{2}$ ” (12,7mm) round-over, a $\frac{1}{4}$ ” Roman ogee and a $\frac{1}{2}$ ” cove. I sometimes include an unmoulded (straight) piece. Try the following stacks (top to bottom): round-over/cove, ogee/cove, straight/ogee, round-over/ogee/cove and straight/round-over/cove.

To make a built-up moulding look as if it were created from a single piece of wood, the strips need to match in





color and grain pattern. The easiest way to achieve this is to cut all of the strips from one wide board that is uniform in appearance and use them in sequence. You can't tell that my built up moulding seen in photo 9 is made up from three pieces.

Applied mouldings

There are two types of mouldings: integral and applied. Integral mouldings are those cut directly on a project component such as tops, shelves, legs, aprons, rails and stiles. Applied mouldings, normally small in cross-section, are used to relieve boring flat panels such as doors and walls, cover transitions between surfaces (hide the gap), hold glass and other panels in place, and cover unattractive edges such as those present on chipboard, MDF and OSB (oriented strand board). There are also architectural applied mouldings such as skirting boards and architraves.

The garage door seen in photo 10 has an area of nearly five square metres. As a single panel it would be boring, boring. Thirty six lengths of 40mm x 12mm moulding create nine panels set in an interesting pattern. The 16mm veneered (red oak) chipboard cabinet door seen in photo 11 looks a lot better after the addition of four

lengths of red oak moulding. These pieces of moulding are small – 22mm x 8mm. You don't want to get your fingers that close to a spinning router bit. Photo 12 shows the solution to this problem. Joint a wide, say 100mm, piece of red oak and then safely rout a wide piece of moulding – left panel. Then rip off an 8mm strip – right panel. Repeat this another three times.

I have made good use of my router table and handful of profile bits and have cut many hundreds of metres of applied mouldings in a variety of patterns. We made the vanity unit in my son's bathroom from maple. You can't buy maple skirting and architraves. Imagine mixing maple and meranti. Never! We made our own maple mouldings. 📌

ABOUT DENIS:



Denis Lock runs a woodworking school and shop in Midrand, Gauteng. He can be contacted at denis.lock@worldonline.co.za or 082-267-5948. Visit his website at www.routingwithdenis.co.za
Copyright © 2018 – DN Lock

9



Completed crown moulding

10



Garage door – 9 panels

11



Cabinet door

12



Making small applied mouldings

The humble workbench

>> Tobias Lochner

No matter what type of wood-working we do, we all need a workbench. Of course we can hack away on a plank precariously placed on two paint tins, but at some point, we realise that there must be something more suitable, user friendly and a lot less dangerous!

Back to basics

In my opinion, woodworking workbenches have to fulfil the following requirements:

- Be at the correct working height for you.
- Be a suitable length to cover most of your project requirements.
- Be a suitable width to cover most of your project requirements.
- Be heavy enough, so that it does not move around when you are planing or sawing.
- Have a thick enough worktop, so that it does not spring and bounce when using mallets and chisels.
- Have at least two very good vises that don't rack.
- Have at least one row of bench dog holes that fit your bench dogs and holdfasts, as well as matching the tracking lines of your vises.
- Have heavy and sturdy legs that can accept dog holes.
- Have a really flat worktop
- Be made from stable wood.

There have been endless books and magazine articles written about the perfect workbench - from Shaker style, Roubo style, Moravian style, English style, Scandinavian style, Hybrid style and others, however, only you can define your own requirements and style of bench.



Are you in the market for a new workbench? Consider these important points



For example, let us assume that you only make Windsor chairs, you really don't need a three metre long behemoth of a bench, but you do need it to have excellent vises and dog hole layouts for it to be wide enough to comfortably handle the footprint of the majority of your projects with a little extra to spare.

My personal preference is for a heavy, solid wood bench with one face vise and twin independent tail vises. I like this configuration. It has served me very well for nearly 30 years. Whether you opt to buy a quality workbench, or you choose to make your own to suit your particular requirements, consider these important factors.

Workbench height

The surface of your worktop should be approximately the same distance from the floor as the knuckles closest to your wrist, when standing and relaxed. It is extremely important to keep in mind that you almost never work at exactly the worktop height, 99% of the time you work on something that is placed on top of the bench, not at the actual worktop level, so this factor must be part of your bench height calculations.

Your vise configuration should be as efficient as possible. One face vise and either one inset tail vise, two inset tail vises, or a full width tail vise in either a



Bench made by Sjobergs of Sweden





A workbench of yesteryear

twin screw or single screw configuration are the most popular formats.

- Do you want the workbench to be a completely multi-purpose workstation, or do you want to use it in conjunction with a separate assembly/glue-up table? I have used the latter system for many years and this way my bench stays clean and glue free, but most importantly, my bench is available for continued work while my glue-up is sitting clamped on the assembly table.
- Do you want to fit cupboards and drawers into your bench? This has both negatives and positives. When a bench is fitted with a cupboard/drawer module, there is no space for your legs when working seated and close to the bench. Space for holdfast shafts is also then limited. On the other hand, your tools are close at hand, and the weight of the cupboard/drawer module and its contents adds to the overall weight of the bench. Personally, I don't have cupboards or drawers under my bench, I make use of a tool till behind me and this works well for my kind of woodworking.
- Your workbench position within your workspace is extremely important. Firstly, consider the natural light that you have available. Natural raking light across the bench is critical for me. You also need a fair amount of space around your bench, especially for the tail vise end of the bench.

- Consider carefully whether you will opt for your bench sitting against a wall, or free standing in your workshop. Once again, my preference is for placing my bench so that I can work on it from all sides. I don't like the wall placement idea, as it has too many limitations. If you have limited space and you wish to place your bench in a free standing position, simply put the bench on heavy duty braked rubber castors, your bench is then usable wherever you want it, and can be rolled back and out of your way when not in use.
- Something that many woodworkers don't consider is that your workbench vises must be laid out in the correct format for your dominant hand - right handed benches have the face vise on the left and left handed benches on the right. If you are purchasing a bench, make sure that the bench has the availability to reposition the face vise into the correct position for you.

Purchasing a new bench

Whether you choose to buy a good quality imported bench or make your own, is up to you.

Don't think that making your own top quality bench with decent hardware will be cheaper in the long run than buying one off the shelf. Do your sums carefully.

There are very few really good brands of workbenches on the world market, and the best ones come from Scandinavia and Europe.

Whatever your choice for your workbench (purchased or custom built yourself), always buy well and for the long term, you will be rewarded. Decent quality hardware, vises, dogs and holdfasts are once in a lifetime purchases, so buy properly and buy once!

If you wish to build your own bench, talk to fellow woodworkers that have done it and got the T-shirt. You are not re-inventing the wheel here, you are simply building a tool that must do its duty well, and without fail.

In South Africa, we at last have excellent woodworking benches and bench hardware available. From brass, steel and aluminium bench dogs and pups, to holdfasts and shooting board kits, from twin screw chain drive vises to single screw front vises, tail vise kits, carver's vises and at last, beautifully made Moxon vise kits for those woodworkers who enjoy hand cutting their dovetails.

In closing, please remember the following:

- If you are going to build your own bench, always acquire all of your hardware first!
- If you are going to buy your workbench, make sure that the height and vise configuration will work for you!

Whether you are buying or building a bench, remember to maintain it properly. Keep your vise screws clean and lubricated, keep your benchtop clean, oil your bench regularly, keep your dog holes free of debris and glue and keep your benchtop flat! 📐

Resource

Article and images supplied by BPM Toolcraft (Pty) Ltd. www.toolcraft.co.za. Questions for Tobias can be directed through the "Ask Our Experts" page.



WOODWORKER'S Showcase

Michael's cheese board

Our expert woodworker, Denis Lock believes that passing on one's skills is of vital importance. Says Denis: "My workshop and classroom assistant, Michael Sibanda, has been with me for five years. During this time he has become a competent woodworker. During slack periods I leave him to his own devices. My only instruction is: "Surprise me!"



Michael recently made a batch of cheese boards from strips of American Ash left over from an earlier job. After planing, thicknessing and close examination of grain direction, they were laminated using a waterproof glue. The handle, which was pattern routed, is fitted with a mortise and tenon joint (how else?). The finish is liquid paraffin; food safe, odourless and tasteless, and does not go rancid like most plant oils do. Are you passing on your woodworking skills?"

Just make two

When an acquaintance asked Hennie Ackermann to make her a table, he jumped at the chance. She had seen a similar piece in a second hand shop but it was too small for her needs and quite expensive. Hennie's wife also saw the table and requested one, so he decided to make two. Both women display their tables in their homes with pride.



Hennie says: "I designed the table myself, made printouts of the components and made it all out of kiaat. I only made the blanks for the legs and got someone else to do the turning from the detailed drawing I provided. I am not a wood turner as such. I turn simple stuff when I have to. It was difficult to make the rounded apron but one can manufacture homemade jigs and clamps to do the job."

Helping a friend

When a burst pipe in a friend's bathroom caused untold trouble, David Reimers stepped in to help. With the pipes back in place, the homeowner decided to make a change to the existing vanity to rectify an earlier mistake. The original vanity, with two drawers, had to be lowered to achieve a better height to the top of the basin. David was able to cut out the back of the drawer to accommodate the bottle trap and oak was tinted to match the Burmese Teak of the original vanity.



Woodworking events

The Woodworking Association of Pretoria hosts their Woodwork Expo and Craft Fair

Venue: New Hope School, 163 Cecilia Road, Ashlea Gardens, Pretoria

Date: 6 -7 October

Time: Sat: 8am to 4pm; Sun: 8am to 3pm

Entrance: R30 adults; scholars – free

Showcase your work



The Home
HANDYMAN

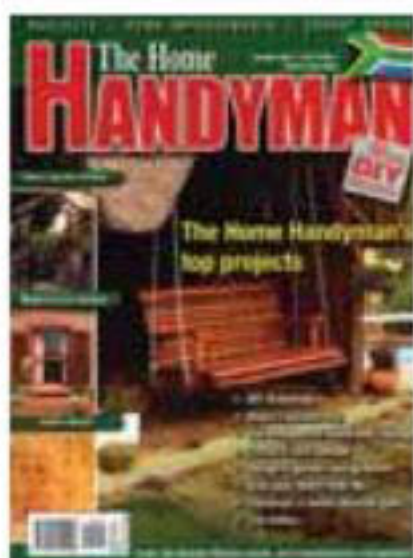
www.homehandyman.co.za

Please send us pictures of your project.

Write a caption with your name, surname, inspiration, type of wood, etc. and send to editorial@homehandyman.co.za

MISSING AN ISSUE?

JANUARY 2012



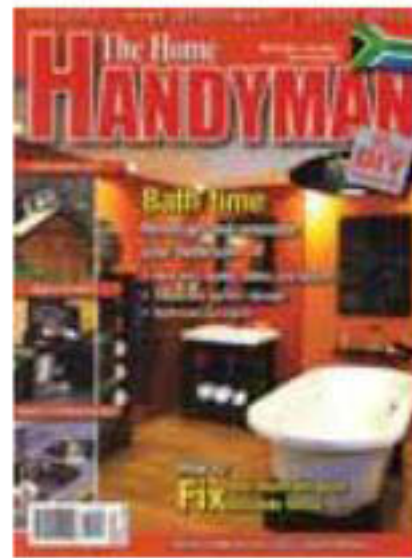
- Top The Home Handyman projects
- Make a garden archway
- Install a shower

FEBRUARY 2012



- Wall cladding
- Construct a garden gate
- Make a child's rocking horse

MARCH 2012



- Redesign a bathroom
- Build a garden shed
- Install a countertop and sink

APRIL 2012



- Protect and secure your home
- Construct a flower stand
- Install your own cabinets

MAY 2012



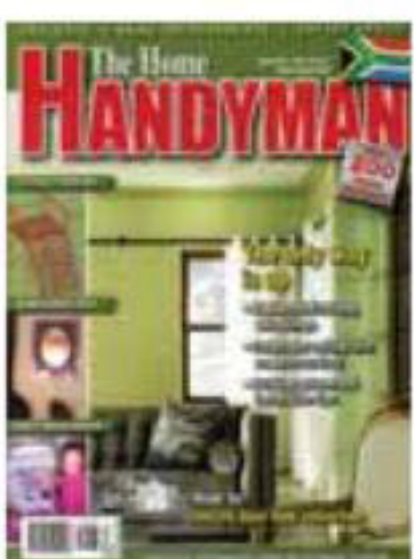
- Repair problem plaster
- Install an outdoor light
- Make a wine rack

JUNE 2012



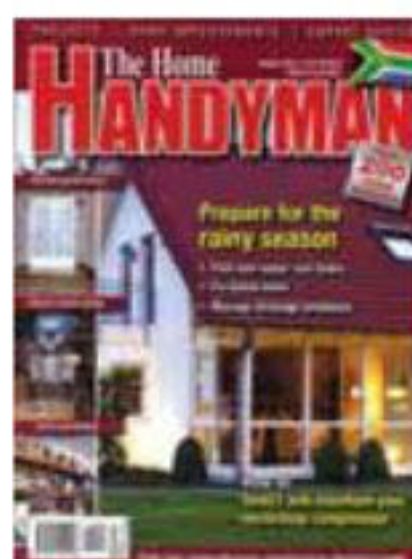
- DIY cabinets
- Construct a metal shoe stand
- Make indoor flower planters

JULY 2012



- Ceilings, cornices and skirtings
- Construct a jungle gym
- Build a hanging cupboard

AUGUST 2012



- Repair roof leaks
- Install wall shelves
- Revamp garden steps

SEPTEMBER 2012



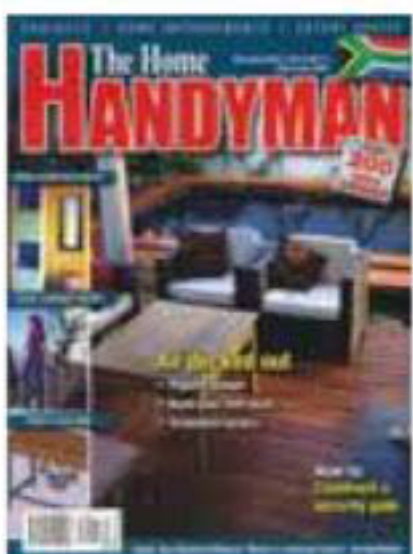
- Hints and tips for patios
- Construct a patio table
- Revamp your bar area

OCTOBER 2012



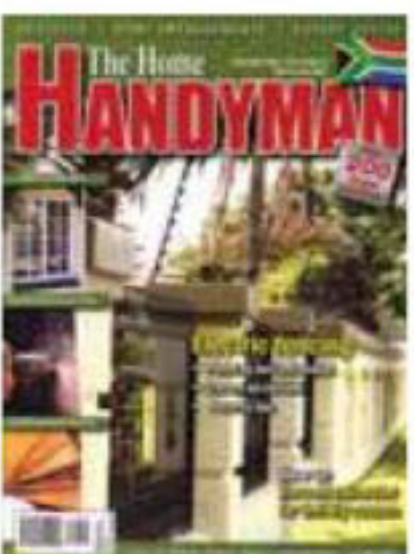
- Latest floor materials and designs
- Build a bobbin sander
- Make a plant stand

NOVEMBER 2012



- Build your own deck
- Make a bathroom cabinet
- Build a router table

DECEMBER 2012



- Electric fencing installation
- Make burglar bars
- Install laminate flooring

JANUARY 2013



- 12 top projects
- Install a bathroom basin
- Manage drainage problems

FEBRUARY 2013



- Install a water feature
- Make a metal fire pit
- Tips for controlling pests

MARCH 2013



- Irrigation systems
- Make a trendy wall clock
- Choose a paving installer

APRIL 2013



- Underfloor heating
- Woodturning inlay work
- Make a home gym bench

MAY 2013



- Natural stone flooring
- Paint and wall coverings
- Child-safe kid's rooms

JUNE 2013



- Insulate your home
- Make a metal bed
- Energy-saving water heating

JULY 2013



- Cure damp problems
- Make a candle holder
- Trendy concrete floor ideas

AUGUST 2013



- Garden drainage
- Make a garden hose holder
- Waterproof your roof

• Order these and more online on www.homehandyman.co.za •

To order back issues for **only R22 each**, use the order form below to obtain any of the following editions: (for orders outside South Africa please phone for a quote)

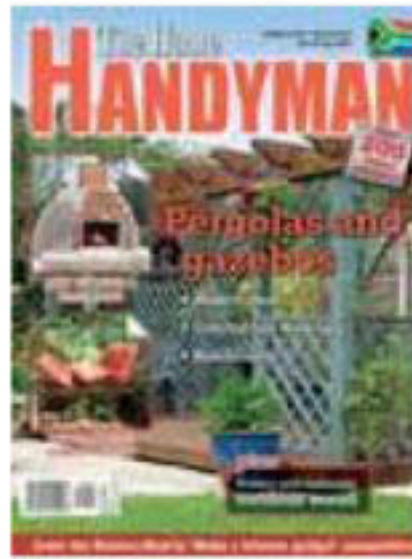
Recent digital back issues can be purchased on www.mysubs.co.za

SEPTEMBER 2013



- All about thatch roofs
- Make a bread bin
- Maintain outdoor metal

OCTOBER 2013



- Pergolas and gazebos
- Build a pizza oven
- Protect outdoor wood

NOVEMBER 2013



- Swimming pools
- Grow your own herbs
- How to install a window

DECEMBER 2013



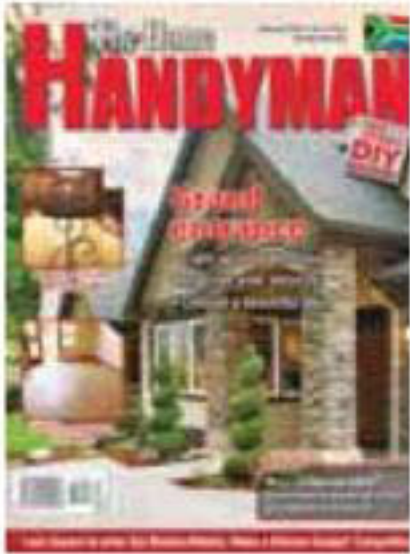
- Cladding options
- Build a brick braai
- Put down instant lawn

JANUARY 2014



- Beautiful ponds
- Install new gutters
- Home lighting

FEBRUARY 2014



- Improve your home entrance
- Make a metal lamp
- Install laminate flooring

MARCH 2014



- Balustrades
- Make a drum braai
- Choosing a garage door

APRIL 2014



- Install a built-in fireplace
- Make metal fireplace tools
- Fix a broken window

MAY 2014



- Bathroom makeover
- Pallet coffee table
- Fix blocked drains

JUNE 2014



- A to Z of tiling
- Make a child's bed
- Construct bedside tables

JULY 2014



- Revamp your kitchen
- Construct wooden bunkbeds
- Build a patio roof

AUGUST 2014



- Garage door facelift
- Make rustic picture frames
- Construct a wendy house part 1

SEPTEMBER 2014



- Jazz up your outdoor area
- Install drip irrigation
- Garden terracing

OCTOBER 2014



- Pools for small gardens
- Prune your plants
- Make a garden trolley

NOVEMBER 2014



- 8 ways to live sustainably
- Harvest rainwater
- Wood protection

YES! I would like to order the following:
(please tick)

- | | | | | |
|-----------------------------------|-----------------------------------|-----------------------------------|-----------------------------------|-----------------------------------|
| ☐ Jan '12 | ☐ Jan '13 | ☐ Jan '14 | ☐ Jan '15 | ☐ Jan '16 |
| ☐ Feb '12 | ☐ Feb '13 | ☐ Feb '14 | ☐ Feb '15 | ☐ Feb '16 |
| ☐ Mar '12 | ☐ Mar '13 | ☐ Mar '14 | ☐ Mar '15 | ☐ Mar '16 |
| ☐ Apr '12 | ☐ Apr '13 | ☐ Apr '14 | ☐ Apr '15 | ☐ Apr '16 |
| ☐ May '12 | ☐ May '13 | ☐ May '14 | ☐ May '15 | ☐ May '16 |
| ☐ Jun '12 | ☐ Jun '13 | ☐ Jun '14 | ☐ Jun '15 | ☐ Jun '16 |
| ☐ July '12 | ☐ July '13 | ☐ July '14 | ☐ July '15 | ☐ July '16 |
| ☐ Aug '12 | ☐ Aug '13 | ☐ Aug '14 | ☐ Aug '15 | ☐ Aug '16 |
| ☐ Sept '12 | ☐ Sept '13 | ☐ Sept '14 | ☐ Sept '15 | |
| ☐ Oct '12 | ☐ Oct '13 | ☐ Oct '14 | ☐ Oct '15 | |
| ☐ Nov '12 | ☐ Nov '13 | ☐ Nov '14 | ☐ Nov '15 | |
| ☐ Dec '12 | ☐ Dec '13 | ☐ Dec '14 | ☐ Dec '15 | |

See our website for more recent issues

No. of copies ordered: x R22.00 each = Total R

Name:

Address:

..... Code:

Tel: Cell:

Email: Signature:

I wish to pay as follows:

- ☐ Direct Bank Deposit to: Nedbank | Sandton | Branch code: 197 005
Cheque account: 197 076 4384 | Reference: "BI+surname" (example BI-Delport)
Fax order form and proof of payment to 086 551 0749
or scan and e-mail admin@homehandyman.co.za

Send order form to HOME HANDYMAN, PO Box 67721 Bryanston 2021
or fax to 086 551 0749. For enquiries call us on 011 462 4815
Email: admin@homehandyman.co.za; website: www.homehandyman.co.za

Price valid until 31 October 2018



Where are my keys?

Reuben 'The Screwman' Hart's disappearing car keys cost him some valuable time and a truckload of money

>> Reuben Hart

We have all been there. Coming out of the shopping centre, and where you thought you parked your car is now a rather empty parking bay. That sinking feeling: Where is my car? Only to find it an hour later, with the help of half the centre staff, you had parked on the level above. Well, the gripping story I'm about to tell, I'm afraid, is of absolutely no relevance.

A few months ago, I had to fly to the big smoke to have knee surgery. We drove to George, our closest airport to fly to Johannesburg. As this was going to be a short trip, we decided to leave the car at the airport. As I locked the vehicle, a little voice in my head was saying: Put the keys in a safe place. Due to the lack of the proverbial doormat or pot plant, the place allocated, was where no man, woman or beast would ever find them.

Surgery done and dusted, a few days of R&R and we will be on our way back to our little hideaway in the middle of nowhere. Not quite. Two days after my surgery, my wife fell ill and was rushed to hospital for emergency surgery. She was not to fly for the next three weeks. I decided to fly back on my own, as we

had left Russell, our dog, at the kennels in Swellendam.

I was to board an early flight back and it was not a minute to soon. Quite frankly, I had more than enough of traffic, traffic lights, taxis and billboards telling me how grim life around me is. Living in a tiny village with only one shop, no traffic, no taxis and a caring community has spoiled me somewhat.

On route, the first thought of car keys popped up and was brushed aside. "It's in a safe place," I told myself. It was only when I handed in the keys of the rented vehicle that the thought: *Where are the keys?* was taken with a little more enthusiasm. Pushing the trolley towards the check in, I started rummaging through my hand luggage, searching for the proverbial 'safe place'. Which indecently, I think, is right next to the place where the other socks go to die. Standing in line the search had escalated to a full Search-and-Rescue.

Panic set in. The clock was ticking. I moved to a more suited location to open my suitcase, right next to the long line of passengers with their keys safely in their pockets. With the contents of my suitcase

now strewn all over the floor, I conceded that the 'safe place' was nowhere near this location, so I boarded the flight. At George airport I reported the matter to a very sympathetic airport official and the matter escalated to a country wide search, with calls to different departments at OR Tambo.

At 16h00 and after 16 cups of coffee, I decided to hire a car and drive the two hundred odd kilometres back home to fetch the spare keys and drive back the following day. The final onslaught to my rather fragile state of mind came when I had to pay the car rental and airport parking fee. I think it would have been cheaper just to leave the car there and buy another. We never did find those keys... ❏

ABOUT REUBEN:



With 40 years of his life in the hardware business and 12 years on radio as 702's DIY guru, behind his belt, Reuben 'The Screwman' Hart decided to pack it up and run for the hills. After traveling 7000km, he and his wife found their hill in Barrydale in the Western Cape.



Shield yourself/Pantser jouself



Laboria

Arma Iuris (Pty) Ltd (established in 2005), inter alia renders the following labour law services. Our services, known as Laboria, include the following nationally:

- A comprehensive **audit** of your business after commencement to ensure that you have all the standard documentation ie. disciplinary code, grievance procedures, charge sheets, etc. Revision of current documentation and/or drafting of all the required documents form part of our presentation.
- **Training** on a national base to all your managers or nominees to ensure the overall understanding of the process to be followed when compiling a charge sheet, serving of the charge sheet to the accused, and if necessary, with the accompanying explanation of his rights and witnesses needed.
- Conducting of **disciplinary hearings** at your designated workplace.
- In case of termination and referral to the **CCMA**, we object to the "Con/Arb" process and resume only with the conciliation for strategic reasons whilst we begin to prepare for the forthcoming arbitration.
- The arbitration is represented by us because both parties become a member of an employer organization the **GDPEO**.

• Union Negotiations.

- **Strikes** either legal/illegal, protected or unprotected.
- Referral of the **CCMA ruling** for **review** if there is merit in doing so.

In addition to the above services we also support you with regard to the following administrative and logistical matters:

- We are available for advice **24 hours a day**.
- Our system provides for action **within 72 hours** after we receive your request. However, if you require a shorter reaction time, it can be arranged in advance.
- We keep track of your **expenses** and at the end of each calendar month, you will be informed of your usage vs fees received by you and how much money was used to provide professional service to you.
- Should it happen that an award is made against you, we will claim from our underwriters, who will pay the claim **on your behalf** on the following basic terms:
 1. We should have been involved from the beginning/start of the case.
 2. You followed our recommendation regarding guilty/innocent as well as the sanction we proposed to be imposed on the accused by you as the employer.

Cost - Our current fee structure is as follows:

- **R 35-00** per month per employee. We will request a list of all your appointed employees on a monthly basis. The amount payable will be calculated in respect of your employees, together with a **R 500-00** monthly fee. For example - Should you have 100 employees, you pay R 3500-00 (R 35-00 per employee) as well as the R 500-00 monthly administration fee.
- Our application form, to be completed by yourself for the use of our services provides for **different payment dates** per month, of which you can choose the option best suited for your company.
- There is no lengthy contracts and 30 days notice apply for both parties.

COBB

TM

COOK ANYTHING, ANYWHERE, ANYTIME

The patented **COBB** cooking system grills, fries, bakes, smokes, boils and warms. This unique light-weight cooking system is **portable, simple** to use and virtually **smokeless**.

The well designed cooking unit ensures even heat distribution allowing food to cook perfectly every time. While the Cobblestone makes your **COBB** searing hot on the inside, the base remains cool to touch on the outside and can be picked up and moved around while cooking. Each part of the **COBB** is dishwasher safe and replacement parts are readily available in South Africa.

Cooking delicious food on your balcony, in your backyard, on your boat or while camping has never been this easy. This is the future of outdoor cooking. This is the **COBB**.

Visit www.cobbonline.co.za or [facebook/CobbSouthAfrica](https://facebook.com/CobbSouthAfrica) for more information.



Roasting



Grilling



Frying



Boiling



Smoking