**Friday afternoon Workshops**

1. **Using Virtual Reality (VR) and Augmented Reality (AR) in Technology Education**

Brenden Davidson

Target audience: Stage 4 - 6

Technology-based subjects continually evolve as new technologies emerge. Two such new and emerging technologies are Virtual Reality (VR) and Augmented Reality (AR). Research is showing that the use of VR and AR can increase student motivation, enhance visual and spatial awareness, support different learning styles, accelerate the design process, foster creativity and allows students to communicate their ideas in new and improved ways. This workshop will provide hands-on demonstrations of how to use VR and AR in Technology Subjects. Demonstrations will focus on how to create immersive experiences, how to use AR and VR as an aid in the design process and as a tool to display and interact with designs.

1. **Making jigs and accessories to help your student make guitars**

Marty Naughton

Target audience: Stage 5 - 6

Do you think that making a guitar is going to be hard work? Do you not know where to start? Marty will help you to get underway and see that it isn’t really as hard as you think.

1. **Taking your Engineering Studies students up a band in the HSC.**

**Paul Copeland**

Target audience: Stage 6

This workshop will look at the best way to approach the Engineering Studies HSC examination and how to ensure your students maximise their marks across the varied exam questions. Past HSCs will be referenced to show where students in the past have missed out on marks that really should have been attained. Areas such as graphical solutions, microstructures and electronics - perennial problems, will be examined.

1. **Demystifying the Major Project portfolio for Multimedia Students**

Selina Giles

Target audience: Stage 6

Documenting Research, Design development and Record of production can be overwhelming for Multimedia students. Often Multimedia students will complete their Major Work in an indirect and unconventional manner. This workshop will endeavour to provide an adaptable framework that can assist your students in presenting a logical and comprehensive portfolio for their final submission that is easily understood by the markers.

This talk will cover:

Research

Materials

Processes

Technologies

Resources and

All the other stuff that doesn’t fit into these subheadings

Development of ideas

Sketching and idea generation

Prototyping and testing

Production and working drawings

Record of production

            Production processes

            Design modifications

            6 Minute video

1. **Coding for beginners with microbit**

Leanne Mclean

Target audience: Stage 3 - 4

Microbits are a cheap and simple processor with which to introduce students to coding and the concepts, which support coding. It is also easy for staff to use, not all staff have computer training and this product is so well supported that it is suitable for beginners (even if you’re the teacher)

Participants will need a Computer to access the coding.

1. **Physical Computing**

Peter Mahony – MAAS

Target audience: Stage 4 - 5

Thinking about how TV remotes, game controllers and other smart devices work brings us eventually to microprocessors. In this hands-on programmable electronics workshop, you will build your understanding of how non-computerised smart devices function, thanks to microcontrollers such as Arduino. Using code language based on C/C++, discover how to control an Arduino featuring the MAAS ThinkerShield. Learn how to write code to control the ThinkerShield’s LED lights and create custom light patterns, and once you’ve mastered that, the possibilities are endless!

1. **STEM Transition for stage 3 and 4**

Steve Delaney

Target audience: stage 3 – 4

The presenter will lead teachers through effective strategies, systems & projects to engage and enhance primary education using the students & resources at your (high) school. Teachers will collaborate & develop potential faculty strategies to implement in their community to promote the positive things their school has to offer & effectively engage their primary school community.

1. **Useful metal projects for Technology Mandatory - Material Technology**

Gerald Harding

Target audience: Stage 4

Helping you integrate traditional Metal based & other material projects into the new syllabus to give more relevance and to give quality outcome for students of all abilities. Tips, tricks and project ideas.

1. **I'm young, why should I even bother with what my super could do for me?**

**Feel future ready – take a step towards a better tomorrow.**

Julie Colls

Target audience: all educators (with a main target of first state super members)

Do you think that retirement is too far off into your future?

Super will be one of the largest assets you will ever own and we want to help you make the most of it. Our specialists will guide you through some of the super basics to equip you with the information you need to feel future ready.

We’ll cover how you can save on fees; balance debt whilst contributing to super; reduce your tax bill and help you find the best investment options available for your risk profile.  Our specialist presenters will guide you through these topics to help you understand your options and make informed decisions about your future.

1. **Spend more time in the Industry Show**