This syllabus is intended to aid instructors in providing training for this tool, and for quick reference by existing users. It is not intended to teach you the tool by itself.

1. Safety

1.1. PPE

- Safety glasses required
- Hearing protection required
- Mask/respirator recommended

1.2. Entanglement risks

- No loose clothing or cables
- Long hair must be tied back
- No jewellery/watches

1.3. Kickback and disc hazards

- Use both hands to maintain control
- Never use damaged or unlabelled discs
- Let grinder reach full speed before contacting material
- Avoid twisting or binding the disc in the cut
- Ensure material is clamped or secured to avoid movement
- Always use the correct disc for the material
- Ensure side handle is fitted and used for control

1.4. Flying sparks and debris

- Do not use near flammable materials
- Sparks may ignite dust
- Ensure bystanders are clear and wearing eye protection
- Be aware of hot workpiece and surrounding area after grinding

2. Startup checks

2.1. Surrounding area cleared of obstacles and flammables

2.2. Other workshop users alerted and using appropriate PPE

2.3. Angle grinder inspection

- Ensure battery is charged and securely fitted
- Check disc is appropriate, undamaged, and firmly secured
- Ensure disc guard is in place and correctly adjusted for the job
- Ensure side handle is installed and tight
- Tool is powered off before inserting battery
- Disc spins freely by hand before starting
- Check for visible damage or wear to body, battery, or switch

2.4. Workpiece setup

- Free of oils, greases, or flammable residues
- Securely clamped or held in a vice
- Ensure cutting/grinding path is clear and won’t strike clamps, benches, etc.

3. Usage

3.1. Starting the machine

- Insert battery with tool switched off
- Hold firmly with both hands

- Engage safety lock and trigger
- Allow disc to spin up fully before contacting workpiece

3.2. Stopping the machine

- Release the trigger
- Wait until disc has come to a complete stop before setting down
- Remove battery before changing disc, adjusting guard, or inspecting

3.3. Cutting or grinding

- Use correct disc for application (cutting, grinding, flap sanding, wire wheel, etc)
- Maintain a firm grip with both hands
- Use a shallow approach and avoid forcing the tool
- Let the grinder do the workload
- Maintain the correct angle (e.g. 15-30° for grinding)
- Never grind with the side of a cutting disc
- Avoid sudden contact
- Do not use worn-down discs intended for larger grinders

3.4. General

- Never use without disc guard
- Never use wet or in the rain
- Never carry by the battery or with finger on the trigger
- Ensure disc is suited for the tool
- Use in well ventilated areas

4. Intended Use

- Designed for cutting, grinding, sanding, or brushing of:
  - Steel
  - Non-ferrous metals
  - Stone, concrete, brick (with proper disc)
  - Plastics (with appropriate care)
- Not intended for:
  - Wood (except specialty discs with full PPE)
  - Glass

5. Post Usage

- Power off and remove battery
- Allow disc to cool before changing or storing
- Clean up debris and dust
- Return tool to charging station or storage
- Dispose of used discs properly
- Do not leave grinder unattended with battery inserted

6. Maintenance

6.1. General

- If the grinder becomes excessively hot, sparks unusually, or makes unusual noise, stop immediately and report
- Clean tool after use with brush or air
- Do not submerge in liquids

- Report worn or damaged discs or guards
- Do not attempt internal repairs