Sliding Table Saw Altendorf Operation and Guarding Check

1.0 Objective & Intent

This SOP establishes mandatory safety procedures for operating an Altendorf sliding table saw and performing a pre-use guarding check. The primary objective is to prevent serious injuries including lacerations, amputations, and kickback events by ensuring all machine guards, riving knives, anti-kickback devices, and emergency stops are functional and correctly positioned before any cut is made. This procedure supports compliance with WorkSafeBC OHS Regulation Part 12 (Tools, Machinery and Equipment) and Part 16 (Wood Products Manufacturing).

2.0 Operational Scope

This procedure applies to all Altendorf sliding table saw models (including F45, F90, and WA series) located in the main production area, custom millwork department, and panel processing cell. It covers all operators, setup technicians, maintenance personnel, and apprentices who operate, adjust, or clean the saw. This SOP does not apply to manual table saws, panel saws, or CNC routers.

3.0 Hazard Identification & Mandatory PPE

- Rotating Blade Contact: Severe laceration or amputation risk from exposed saw blade below table and above table during operation.
- Kickback: Workpiece violently thrown back toward operator due to pinching, dull blade, or missing riving knife.
- Pinch Points: Sliding carriage travel path, blade guard pivot points, and rip fence clamping mechanism.
- Noise Exposure: Continuous noise levels exceeding 85 dBA during cutting operations.
- Dust Inhalation: Fine wood dust and respirable crystalline silica from MDF, particleboard, and hardwood.
- CSA-Approved Steel Toed Boots with slip-resistant soles
- Safety Glasses with side shields (Z87.1 rated) or full face shield when blade changes are performed
- Hearing Protection (earplugs or earmuffs with NRR 25 or higher)
- Cut-Resistant Gloves (ANSI A5 or higher) for handling sharp stock and blade changes only – never during cutting
- Dust Mask (N95 minimum) or half-face respirator with P100 filters when dust extraction is insufficient
- Fitted clothing, no loose sleeves, jewelry, or gloves near rotating parts

4.0 Required Safety Equipment & Tools

- Lockout/Tagout (LOTO) Kit with personal lock, hasp, and danger tag
- Altendorf blade guard assembly (crown guard, riving knife, anti-kickback pawls) – verified present and undamaged
- Push sticks (minimum two, 24-inch length) and push blocks with non-slip grip
- Featherboards (magnetic or clamp-on) for narrow ripping operations
- Dust collection system connected and operational (minimum 1000 CFM at the saw)
- Emergency stop button – functional and unobstructed
- Blade changing tools (Altendorf wrench set, arbor lock pin)
- Workpiece support rollers or outfeed table for long panels

- Clearing hook or brush (never hands) for removing debris near blade

5.0 Step-by-Step Safety Procedure

1. Verify the work area is clean, dry, and free of trip hazards. Confirm that the dust collection system is running and all hoses are connected to the saw's dust ports. Ensure adequate lighting is present over the blade and sliding table area.
2. Perform a visual inspection of the blade guard assembly. Confirm the crown guard is present, not cracked, and pivots freely. Verify the riving knife is installed, aligned with the blade, and set to the correct thickness for the blade kerf. Check that anti-kickback pawls are clean, spring-loaded, and engage properly when lifted.
3. Inspect the saw blade for damage. Look for missing carbide tips, cracks, warping, or excessive pitch buildup. Verify the blade is the correct type for the material being cut (e.g., crosscut, rip, or combination). Never operate with a dull or damaged blade.
4. Test the emergency stop button by pressing it while the saw is running (if already on) or by simulating a stop. Confirm the saw stops within 10 seconds. Reset the button and verify the saw will not restart until manually reset. Document the test on the daily inspection log.
5. Adjust the riving knife height so it extends at least 3 mm above the top of the workpiece for through cuts. For non-through cuts (dadoes, grooves), the riving knife must be set as high as possible without interfering with the cut. Lock the knife securely.
6. Set the blade height so the blade teeth protrude no more than 6 mm above the top of the workpiece. This reduces exposure and kickback risk. For sliding table operations, ensure the blade is parallel to the sliding carriage travel path.
7. Position the rip fence or crosscut fence and lock it securely. For ripping, use a push stick for the final pass when the workpiece is within 150 mm of the blade. For crosscutting on the sliding table, ensure the workpiece is firmly against the fence and the carriage is fully retracted before starting the cut.
8. Start the saw and allow it to reach full speed. Feed the workpiece smoothly and steadily. Never reach over the blade or behind the cut line. Keep hands at least 150 mm from the blade at all times. Use push sticks, featherboards, or hold-downs for narrow or unstable stock.
9. After completing the cut, retract the sliding carriage fully and wait for the blade to come to a complete stop before removing scrap or adjusting the fence. Use a clearing hook or brush to remove debris near the blade. Never use compressed air to clean the saw.
10. When the saw is not in use, lower the blade below the table, disengage the main power with the disconnect switch, and apply a personal LOTO lock. Remove the blade guard only for maintenance and reinstall immediately after. Report any guard damage or malfunction to the supervisor before the next shift.