Workshop Clock Care Checklist

(Follow these steps to ensure reliable performance and professional standards)

Purpose

This checklist is designed to support horological conservators and technicians in carrying out thorough post-repair inspections. By following these steps, you ensure that repaired clocks are safe, reliable, and aligned with conservation best practice.

Instructions

- Use this checklist during the final inspection stage of any repair.
- Work systematically through each section: Structural & Assembly, Mechanical & Functional, Finishing & Detailing, and Testing & Quality Control.
- Tick each box once the action has been completed and verified.
- Record any observations or adjustments in your workshop notes for future reference.
- Treat this as both a training aid and a practical tool to reinforce consistent standards.

Structural & Assembly

- Secure taper pins and finish them neatly with draw-filing
- Check all components (crutch, pallet frame, hands, collet, pins) are firmly fitted
- Align crutch accurately with back-cock slot for smooth pendulum motion
- Ensure clock is stable and properly fixed (wall or mantel case)

Mechanical & Functional

- Torque test all mainsprings and weigh all driving weights. Test with calibrated sectional weights as needed.
- Upright and deburr all bushings correctly
- Clean and peg out holes and sinks thoroughly
- Confirm canon wheel and star wheel pin clear the back of hour bridge

- Maintain rating system: sound thread, clean slide, undamaged bob. Can the clock be regulated by the client.
- Adjust escapement: pallet faces are hardened, correct drop.
- Test striking rigorously; ensure springs (eg hammer spring rack spring) do not touch plates. Check striking work releases at the correct time.
- Balance rack spring and other springs to appropriate strength

Finishing & Detailing

- Carefully check all bearing surfaces for lubrication. Investigate thoroughly anything that squeaks.
- Check all mobiles for lodged Grit-O-Kobs
- Limit refinishing and pivot polishing to agreed work ("less is more")
- Fit hands securely; check collet, pin, and seating of minute/hour hands so they track flat. Check the minute / seconds hand is clear of the glass.
- Provide a well-fitting brass winding key, modified to fit where arbors are tapered.
- Confirm Brocot regulation key is present and the regulation is functioning correctly.
- Vacuum out the case and clean the glass. Secure bezel hinge screws where loose.

Testing & Quality Control

- Test movement in the case for reliability, keeping a rating sheet for at least one full cycle.
- Service case locks and repair or provide keys where necessary
- Prepare case and packing materials for safe transport including splinting the pendulum
- Cut lines to correct length for neat finish
- Compile your report prior to delivery and invoicing
- Pack and label all removed components, old lines etc for return to client.