ISO 9001:2015 Clause 7 Checklist for calibration and verification records (Version 1.0, April 2026)

Each calendar year review against the supporting clause-by-clause checklist in Section 4 (Clause 7.1 Calibration and PVQ assessment, Clause 7.2 Records).

1	Does a dated and signed calibration certificate or verification record exist for every instrument in service, and is it retrievable on request within 24 hours?
2	Does the calibration or verification record show the instrument's unique identifier, the date of calibration, the date the next calibration is due, the accreditation or traceability statement, and the signature of the person who performed the calibration?
3	Does the calibration record show the measured values before and after any adjustment, and the tolerance limits against which the instrument was assessed? If a tolerance has been exceeded, does the record show the corrective action taken and the date it was closed?
4	Does the PVQ assessment cover all instruments in service, and does it identify any that are overdue, or within a defined window of their due date? Is the assessment signed off by the Technical Manager or PVQ, and is the number of instruments in service and the number overdue recorded in the assessment?
5	Do all instruments in service have a current calibration or verification record? Are any instruments in service without a current record, and are they identified and removed from service or quarantined?
6	Where data is kept in an electronic calibration or service management system, does the system maintain a complete audit trail of every change to calibration records, including who made the change and when? Can the system produce a complete calibration history for any instrument on request?
7	Are calibration records retained for at least the period required by the applicable calibration scheme or customer contract, and are they stored in a way that prevents loss or unauthorised alteration?
8	Do the calibration records for the instruments used in the last completed PVQ show that the instruments were in service at the time of the PVQ, and that their calibration was current at the time of the PVQ? Are any instruments used in the last PVQ but not in service now identified and their status recorded?
9	Does the calibration record show the measurement uncertainty associated with the measured values, and does the uncertainty value fall within the tolerance limits? Is the uncertainty value recorded in the same units as the measured value? Does the record show the method used to calculate the uncertainty?
10	Do the calibration records for ICP-OES instruments show the spectral lines used for each element, the wavelength calibration performed, and the results of the wavelength calibration? Do the records show the instrument's resolution and the spectral bandpass used for each element? Do the records show the results of the spectral interference check performed during the calibration? Do the records show the results of the spectral interference check performed during the last PVQ? Are any changes to the spectral lines, wavelength calibration, or spectral interference check made since the last PVQ recorded and assessed?
11	Do the records show that gravimetric weight transfer calibration was used to calibrate the ICP-OES nebulisation system, rather than "transmitting weight" or "calibrating" the pump rotation? Do the records show the weight of the transfer tube, the number of revolutions, the measured weight, and the calculated flow rate? Do the records show the calculation used to convert the measured weight into the calibrated flow rate? Are the records signed off by the person who performed the calibration? Are the records retained for at least the period required by the applicable calibration scheme or customer contract?
	- Do the records show that the calibration was performed on the nebulisation system actually used for the analysis, not on a different nebulisation system or a different instrument? Are the records specific to the instrument and nebulisation system used for the last PVQ?
	- Do the records show the calibration was performed at a flow rate that matches the flow rate used in the last PVQ? If the flow rate has changed since the last PVQ, do the records show a new calibration was performed at the new flow rate?
	- Are the records signed off by the person who performed the calibration? Are the records retained for at least the period required by the applicable calibration scheme or customer contract?
12	Do the records show that the calibration of the nebulisation system was performed before the last PVQ, and that the calibration was current at the time of the last PVQ? If the calibration was performed after the last PVQ, do the records show that the PVQ was repeated after the calibration? Are the records signed off by the person who performed the calibration? Are the records retained for at least the period required by the applicable calibration scheme or customer contract?
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	- Do the records show that the calibration was performed on the nebulisation system actually used for the analysis, not on a different nebulisation system or a different instrument? Are the records specific to the instrument and nebulisation system used for the last PVQ?
	- Do the records show the calibration was performed at a flow rate that matches the flow rate used in the last PVQ? If the flow rate has changed since the last PVQ, do the records show a new calibration was performed at the new flow rate?
	- Are the records signed off by the person who performed the calibration? Are the records retained for at least the period required by the applicable calibration scheme or customer contract?
14	Do the records show that the calibration of the nebulisation system was performed before the last PVQ, and that the calibration was current at the time of the last PVQ? If the calibration was performed after the last PVQ, do the records show that the PVQ was repeated after the calibration? Are the records signed off by the person who performed the calibration? Are the records retained for at least the period required by the applicable calibration scheme or customer contract?
	- Do the records show that the calibration was performed on the nebulisation system actually used for the analysis, not on a different nebulisation system or a different instrument? Are the records specific to the instrument and nebulisation system used for the last PVQ?
	- Do the records show the calibration was performed at a flow rate that matches the flow rate used in the last PVQ? If the flow rate has changed since the last PVQ, do the records show a new calibration was performed at the new flow rate?
	- Are the records signed off by the person who performed the calibration? Are the records retained for at least the period required by the applicable calibration scheme or customer contract?
15	Do the records show that the calibration of the nebulisation system was performed before the last PVQ, and that the calibration was current at the time of the last PVQ? If the calibration was performed after the last PVQ, do the records show that the PVQ was repeated after the calibration? Are the records signed off by the person who performed the calibration? Are the records retained for at least the period required by the applicable calibration scheme or customer contract?
	- Do the records show that the calibration was performed on the nebulisation system actually used for the analysis, not on a different nebulisation system or a different instrument? Are the records specific to the instrument and nebulisation system used for the last PVQ?
	- Do the records show the calibration was performed at a flow rate that matches the flow rate used in the last PVQ? If the flow rate has changed since the last PVQ, do the records show a new calibration was performed at the new flow rate?
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