



Inspect Curtain Wall Drainage Paths and Weep Hole Continuity

Inspect curtain wall drainage paths and weep hole continuity via an interactive, commentable checklist that exports as PDF/Excel to improve moisture control.

Project:

Date:

Filled by:

Preparation and Access

1	Review approved shop drawings and drainage diagrams; identify sill, stack-joint, and mullion drainage routes for each elevation. Mark inspection bays on a plan and attach annotated excerpts.
2	Confirm safe access to weep lines and sills using MEWP or swing stage; inspect tags, harnesses, and daily checks. Record access method, operator certification, and capture a setup photo.
3	Clean exterior surfaces around weeps with soft brush (no sealant disturbance) to expose slots. Photo before/after; bag and label any debris found for report attachment.

Drainage Pathways

4	Probe internal sill channels with a 2.5 mm nylon wire along full bay length; acceptance: continuous passage without hard obstruction. Note resistance points on drawing and photograph probe insertion.
5	Verify vertical stack-joint baffles align over sill drainage entries; acceptance: offset ≤ 3 mm. Use a borescope to capture alignment images at top, mid, and bottom of joint.
6	Check splice sleeves, seal dams, and thermal packers do not create unintended dams; maintain a 10 mm clear gap above dams for drainage continuity. Record close-up photos.

Weep Holes and Vents

7	Measure weep diameter with a drill-gauge card; acceptance: 6–10 mm. Confirm spacing 400–600 mm c/c or per approved project specifications and authority requirements. Record dimensions with scale in photo.
8	Confirm each sill end dam has at least one dedicated weep path; acceptance: visible outlet at each bay end. Document with end-on photographs and note elevation/bay ID.
9	Inspect insect/bug screens or covers; acceptance: intact mesh (≈ 1 –2 mm), seated, and not clogged by paint or sealant. Capture macro photos showing clarity of openings.
10	Verify weep outlets sit ≥ 20 mm above adjacent surfaces or sealant beads to prevent ponding or blockage. Photograph with ruler or gauge showing clear stand-off.
11	Conduct dyed-water path check: introduce 250 mL colored water into interior drainage inlet; acceptance: discharge at corresponding exterior weep within 30 s. Record time-stamped video of inlet and outlet.

Flashings and Trays	
12	Check sill pan or flashing slope outward using a digital level; acceptance: $\geq 1:15$ ($\approx 3.8^\circ$) with tolerance $\pm 0.5^\circ$. Photograph the level reading and the sill reference.
13	Inspect internal upstands and corner joints for continuous sealant fillets; acceptance: no voids or gaps > 2 mm. Record close-ups and sealant batch/lot number labels.
14	Verify exterior perimeter sealant and backer rod do not bridge or cover weeps; acceptance: 25–40% backer compression, clear weep mouths. Photo with probe showing open mouth; record sealant cure date.
15	Confirm thermal breaks, packers, or shims maintain a 10 mm minimum clearance to drainage slots. Borescope cavities where covers obscure visibility and save still images.

Documentation and Testing	
16	Induce light negative pressure (25–50 Pa) in the cavity zone using a portable fan; smoke-pencil near pressure vents should draw inward. Record manometer reading and video evidence.
17	Perform controlled hose spray at weep line: 5 min, 200–250 kPa, nozzle 300–500 mm standoff, avoid jetting into joints. Acceptance: water exits weeps, no interior leakage. Capture continuous video.
18	Use an endoscope to inspect 10% sample of bays for debris, sealant overrun, or misaligned baffles. Acceptance: clean pathways, components seated. Save geotagged images with bay IDs.
19	If blocked, clear weeps with nylon probe or compressed air ≤ 300 kPa; repeat dyed-water test to confirm restored flow. Record before/after photos and note corrective action responsible party.
20	Complete digital sign-off: attach photos, readings, batch numbers, and test videos; note any NCRs. Obtain superintendent and QA signatures; export PDF/Excel with embedded QR for record authentication.

Comments:

Filled by:

Signature:

Introduction	How to use this checklist
Inspect curtain wall drainage paths and weep hole continuity to ensure water leaves the facade quickly and predictably. This checklist focuses on rainscreen drainage, weep slots, sill flashings, and pressure-equalized facade cavities without expanding into unrelated glazing performance or structural topics. By validating drainage continuity—from internal channels to exterior weeps—you prevent ponding, capillary backflow, efflorescence, and concealed corrosion. The process uses practical tools such as feeler wires, borescopes, dyed water, manometers, and controlled spray, while capturing photos, readings, and lot numbers for traceable quality assurance. Acceptance cues include minimum weep sizes, consistent slopes, aligned baffles, intact screens, and measured airflow that indicates a functioning cavity. When issues arise (e.g., sealant bridging, thermal packers blocking slots, or paint overspray), targeted corrections and re-tests confirm restored performance. Use this interactive checklist to assign actions, add comments, and verify closure, then export your records as PDF/Excel with a QR code for secure sign-off.	1. Preparation: Gather drawings, elevation keys, and the app on a tablet. Bring borescope, 2.5 mm probe, digital level, dyed water, hose with gauge, manometer, PPE, and safe access equipment. 2. Create project in the app: Input project, elevation, bay IDs, and assign roles. Upload relevant shop-drawing excerpts for quick reference during inspection. 3. Start interactive mode: Tick each item as you complete it, attach photos/videos/readings, and geotag observations. Use point-by-point acceptance notes to reduce ambiguity. 4. Collaborate: Add comments, tag responsible parties, and set due dates for corrective actions. Log retests with linked evidence to the original observation. 5. Export records: Generate a structured PDF/Excel pack with embedded media links. Include drawings, test parameters, and measurement logs for each elevation and bay. 6. Sign-Off: Capture digital signatures from the superintendent and QA. The export includes a QR code for document authentication and quick retrieval on site.