RISK ASSESSMENT

Risk Assessment: Replacing 6 Broken Roof Tiles on Two-Storey Residential Property

Replacing 6 broken tiles on a 2 story house

REFERENCE
RA-2026-0501

ASSESSMENT DATE
1 May 2026

ASSESSOR
Robert

COMPANY
ABC Roofing Co.

REVIEW DATE
1 May 2027

INDUSTRY
Roofing

✓ Prepared following the HSE 5-Step Risk Assessment Methodology (INDG163)

1. Introduction & Methodology

RA-2026-0501

Activity Description

This assessment covers the replacement of 6 broken concrete or clay roof tiles on a two-storey residential dwelling. The work involves accessing the roof via ladder or scaffold tower, removing damaged tiles, and installing replacement tiles to match existing specification. The property is occupied during works.

LOCATION	Domestic residential property (two-storey terraced or semi-detached house with pitched roof at approximately 6-7 metres ridge height)
WORKERS INVOLVED	2 to 5 qualified roofers holding valid CSCS cards. Members of the public (householders and neighbours) may be present in adjacent areas. No young workers, new or expectant mothers identified for this task.
DURATION	Half working day (approximately 3-4 hours including setup and clearance)

Risk Rating Matrix (5×5)

Risk ratings are calculated as Likelihood (1–5) × Severity (1–5). The matrix below shows how combined scores map to risk levels.

LIKELIHOOD ↑	SEVERITY → 1	2	3	4	5
5	5	10	15	20	25
4	4	8	12	16	20
3	3	6	9	12	15
2	2	4	6	8	10
1	1	2	3	4	5

Low (1–4) Medium (5–14) High (15–25)

2. Hazard Identification & Risk Assessment

RA-2026-0501

Each identified hazard is assessed below with existing controls, additional controls required, and both initial and residual risk ratings.

Hazard 1: Fall from height during access to roof and whilst working on pitched roof surface

HIGH (20)

WHO IS AT RISK?

Roofers accessing and working on roof at approximately 6-7 metres height. Risk of fatal or life-changing injuries from fall to ground level or through fragile roof materials.

EXISTING CONTROLS

All operatives hold valid CSCS cards and have received working at height training. Ladders are Class 1 industrial standard and inspected before use. Safety footwear with good grip worn. Pre-use visual inspection of roof condition conducted from ground level.

ADDITIONAL CONTROLS REQUIRED

Erect scaffold tower with full edge protection (double guardrails at 950mm and 470mm with toe boards minimum 150mm) to provide safe working platform adjacent to repair area. Secure ladder at top and base with 1:4 angle and extend 1 metre above landing point. Use roof ladders with ridge hooks to distribute weight and provide secure footing on pitched surface. Implement exclusion zone at ground level with barriers and signage. Conduct toolbox talk on fall prevention before work commences. Check weather forecast and do not work in high winds (above 25mph), heavy rain, ice or snow. Ensure mobile phone signal available for emergency contact. Establish rescue plan and ensure second operative always present when anyone is working at height.

ACTION BY	TARGET DATE
N/A	N/A

INITIAL RISK RATING

Likelihood 4 × Severity 5 = **20 (HIGH)**

RESIDUAL RISK RATING

Likelihood 2 × Severity 5 = **10 (MEDIUM)**

Hazard 2: Falling objects striking persons below including tiles, tools, and debris

HIGH (16)

WHO IS AT RISK?

Householders, visitors, neighbours, and pedestrians passing below work area. Roofers on ground level during material handling. Risk of head injuries, lacerations, and fractures from falling materials.

EXISTING CONTROLS

Hard hats worn by all site operatives. Verbal warnings given to householder about work overhead. Tools carried in tool belts to prevent dropping. Broken tiles placed carefully into rubble sacks.

ADDITIONAL CONTROLS REQUIRED

Establish exclusion zone minimum 3 metres around base of work area using barriers, cones and hazard tape. Erect warning signs stating 'Danger Overhead Work - Keep Out'. Arrange with householder to restrict access to garden and driveway during works. Use debris netting or sheeting secured to scaffold to catch any falling materials. Lower broken tiles and materials to ground using rope and bucket system or tool bag - do not throw from height. Assign ground operative to maintain exclusion zone and prevent unauthorised access. Schedule work to avoid school drop-off and collection times if property adjacent to pedestrian routes. Inform immediate neighbours of work schedule.

ACTION BY	TARGET DATE
N/A	N/A

INITIAL RISK RATING

Likelihood 4 × Severity 4 = **16 (HIGH)**

RESIDUAL RISK RATING

Likelihood 2 × Severity 4 = **8 (MEDIUM)**

Hazard 3: Manual handling injuries from lifting and carrying tiles, scaffold components, ladders and equipment

MEDIUM (9)

WHO IS AT RISK?

All roofers involved in transporting equipment and materials from vehicle to work area and up to roof level. Risk of musculoskeletal injuries to back, shoulders, and limbs particularly when working on ladders or uneven ground.

EXISTING CONTROLS

Operatives have received manual handling training. Tiles carried in small batches. Two-person lift used for ladders and heavy scaffold components. Mechanical aids such as sack trucks available in vehicle.

ADDITIONAL CONTROLS REQUIRED

Conduct manual handling risk assessment before moving heavy items. Use mechanical hoist or gin wheel attached to scaffold to raise tiles and materials to roof level rather than carrying up ladder. Break loads into smaller batches - maximum 3-4 tiles carried at once. Ensure clear access route free from trip hazards between vehicle and work area. Use trolley or sack truck on firm ground where possible. Maintain good posture and use kinetic lifting techniques - bend knees not back. Rotate tasks among team to avoid prolonged repetitive lifting. Take regular breaks. Ensure adequate lighting if working in early morning or evening.

ACTION BY	TARGET DATE
N/A	N/A

INITIAL RISK RATING

Likelihood 3 × Severity 3 = **9 (MEDIUM)**

RESIDUAL RISK RATING

Likelihood 2 × Severity 3 = **6 (MEDIUM)**

Hazard 4: Slips, trips and falls on ground level from uneven surfaces, cables, materials and equipment

MEDIUM (6)

WHO IS AT RISK?

All workers moving around site with equipment and materials. Householders and visitors accessing property during works. Risk of sprains, fractures, and soft tissue injuries from falls on driveways, paths, and garden areas.

EXISTING CONTROLS

Site walkover conducted on arrival to identify hazards. Safety footwear with ankle support and slip-resistant soles worn. Materials stored in designated area away from access routes. Operatives briefed to maintain good housekeeping.

ADDITIONAL CONTROLS REQUIRED

Clearly mark all cables and hoses with high-visibility tape and route away from walkways where possible. Use cable protectors where cables cross pedestrian routes. Store all materials and equipment in consolidated area marked with barriers. Keep access routes clear at all times - remove debris and tools immediately after use. Place scaffold boards on soft ground to create stable walkway if ground conditions poor. Ensure adequate lighting if working in low light conditions. Inform householder of safe access route to property. Conduct regular housekeeping inspections throughout work period. Clean up all debris, nails, and broken tile fragments at end of each work session.

ACTION BY	TARGET DATE
N/A	N/A

INITIAL RISK RATING

Likelihood 3 × Severity 2 = **6 (MEDIUM)**

RESIDUAL RISK RATING

Likelihood 2 × Severity 2 = **4 (LOW)**

Hazard 5: Contact with asbestos-containing materials in older roof structure or cement tiles

MEDIUM (10)

WHO IS AT RISK?

All roofers who may disturb asbestos cement tiles, felt, or insulation materials during removal of broken tiles. Risk of asbestos fibre inhalation leading to asbestosis, lung cancer, or mesothelioma with long latency period.

EXISTING CONTROLS

Operatives hold asbestos awareness training certificates. Visual inspection of materials conducted before work. Company holds register of properties known to contain asbestos. Work stops immediately if suspected asbestos identified.

ADDITIONAL CONTROLS REQUIRED

Conduct desktop review of property age - houses built pre-2000 may contain asbestos materials. Obtain asbestos survey from householder if available. If property built pre-1990 and no survey available, presume materials may contain asbestos and work on assumption basis. If asbestos cement tiles confirmed or suspected, only remove if tiles are intact and work can be done without breaking. Wet tiles before removal to suppress fibres. Use disposable coveralls, RPE (FFP3 masks minimum), and double-bag waste in asbestos waste bags with correct labelling. Do not use power tools or break tiles. If extensive asbestos work required, stop and arrange licensed asbestos contractor. Keep householder informed of any asbestos findings. Maintain records of asbestos exposure for 40 years.

ACTION BY	TARGET DATE
N/A	N/A

INITIAL RISK RATING

Likelihood 2 × Severity 5 = **10 (MEDIUM)**

RESIDUAL RISK RATING

Likelihood 1 × Severity 5 = **5 (MEDIUM)**

Hazard 6: Adverse weather conditions including high winds, rain, ice, and extreme temperatures affecting stability and grip

MEDIUM (12)

WHO IS AT RISK?

Roofers working on exposed pitched roof surface. High winds can cause loss of balance and blow materials from roof. Rain and ice create slippery surfaces. Cold temperatures reduce dexterity. UV exposure in hot weather causes dehydration and sunburn.

EXISTING CONTROLS

Weather forecast checked on morning of work. Supervisor has authority to postpone work if conditions unsuitable. Operatives wear appropriate clothing for conditions. Water available in vehicle.

ADDITIONAL CONTROLS REQUIRED

Check detailed weather forecast 24 hours before and on morning of work. Do not commence work if wind speeds forecast to exceed 25mph (Force 6) or gusts above 35mph. Stop work immediately if wind speed increases or rain begins. Do not work on roof if ice, frost, or snow present - wait for surfaces to dry completely. In hot weather above 25 degrees Celsius, ensure adequate hydration breaks every hour and provide sun cream. Wear high-visibility waterproof clothing in rain. Use gloves with good grip in cold or wet conditions. Secure all materials and tools to prevent wind displacement. Monitor weather conditions continuously throughout work period using weather app or radio. Have contingency plan to make roof weathertight if work must be abandoned due to weather deterioration.

ACTION BY	TARGET DATE
N/A	N/A

INITIAL RISK RATING

Likelihood 3 × Severity 4 = **12 (MEDIUM)**

RESIDUAL RISK RATING

Likelihood 2 × Severity 4 = **8 (MEDIUM)**

Hazard 7: Contact with overhead electrical cables during ladder placement and scaffold erection

MEDIUM (10)

WHO IS AT RISK?

Roofers positioning ladders and scaffold towers near building. Risk of electrocution or serious burns from contact with or arcing from live overhead power lines, particularly 11kV or 33kV distribution cables.

EXISTING CONTROLS

Site survey conducted before equipment positioning. Operatives briefed to look up before raising ladders or scaffold components. Minimum 3 metre exclusion zone maintained from visible overhead cables.

ADDITIONAL CONTROLS REQUIRED

Identify all overhead cables during site survey and measure clearance distances. Maintain minimum safe distances: 3 metres from cables up to 33kV, 5 metres from cables above 33kV. If voltage unknown, assume higher voltage and maintain 5 metre clearance. Mark exclusion zones on ground with spray paint or barriers. Use non-conductive fibreglass ladders if working near cables. Contact Distribution Network Operator (DNO) if adequate clearance cannot be achieved - request cable diversion or temporary disconnection. Use goal post system or barriers to prevent accidental encroachment into exclusion zone. Appoint trained banksman to supervise all ladder and scaffold movements near cables. Brief all operatives on electrical hazards during toolbox talk.

ACTION BY	TARGET DATE
N/A	N/A

INITIAL RISK RATING

Likelihood 2 × Severity 5 = **10 (MEDIUM)**

RESIDUAL RISK RATING

Likelihood 1 × Severity 5 = **5 (MEDIUM)**

Hazard 8: Inadequate emergency arrangements including first aid provision, fire response, and rescue from height

MEDIUM (8)

WHO IS AT RISK?

All workers and householders in event of accident, injury, fire, or person suspended in fall arrest equipment. Delayed emergency response could worsen injuries or prevent effective rescue.

EXISTING CONTROLS

First aid kit carried in company vehicle. Mobile phones held by operatives. Nearest hospital location known. Fire extinguisher available in vehicle. Company emergency contact numbers displayed.

ADDITIONAL CONTROLS REQUIRED

Ensure minimum one operative on site holds valid First Aid at Work or Emergency First Aid at Work certificate. Confirm mobile phone signal strength at location before work commences. Record exact property address and nearest cross street for emergency services. Identify nearest Accident and Emergency department and route (confirm St. Mary's Hospital or equivalent). Position first aid kit at ground level in accessible location known to all operatives. Establish rescue plan for person injured at height - ensure ladder or scaffold provides safe descent route and second operative always available to assist. Keep vehicle access route clear for emergency vehicle access. Inform householder of emergency procedures and request they keep phone line available. Carry emergency contact details for all operatives. If working alone at any point, implement buddy system with timed check-in calls every 30 minutes. Record all accidents, injuries, and near-misses in company accident book and report RIDDOR-qualifying incidents to HSE within required timescales.

ACTION BY	TARGET DATE
N/A	N/A

INITIAL RISK RATING

Likelihood 2 × Severity 4 = **8 (MEDIUM)**

RESIDUAL RISK RATING

Likelihood 1 × Severity 4 = **4 (LOW)**

3. Legislation, Declaration & Sign-off

Relevant Legislation

The following legislation is relevant to this risk assessment and should be consulted for full compliance requirements.

- Health and Safety at Work etc. Act 1974
- Management of Health and Safety at Work Regulations 1999
- Reporting of Injuries, Diseases and Dangerous Occurrences Regulations 2013 (RIDDOR)
- Work at Height Regulations 2005
- Construction (Design and Management) Regulations 2015
- Provision and Use of Work Equipment Regulations 1998
- Control of Asbestos Regulations 2012
- Personal Protective Equipment at Work Regulations 1992
- Manual Handling Operations Regulations 1992
- Electricity at Work Regulations 1989

Declaration

This risk assessment has been prepared following the HSE 5-step methodology (INDG163) and is believed to be suitable and sufficient for the described activity. It must be reviewed at the stated review date, or sooner if: (a) there is reason to suspect it is no longer valid, (b) there has been a significant change in the work activity, equipment, or personnel, (c) an accident, incident, or near-miss occurs related to the assessed activity, or (d) new legislation or industry guidance is published that affects the assessment.

> ⚠ **Important:** This assessment must be reviewed and approved by a competent person (as defined in Regulation 7 of the Management of Health and Safety at Work Regulations 1999) before implementation in the workplace. The employer retains ultimate responsibility for ensuring the health and safety of employees and others affected by the work activity.

Sign-off

ASSESSOR NAME	Robert
ASSESSOR SIGNATURE	
DATE	1 May 2026
REVIEWED BY	

REVIEW DATE	1 May 2027