
Quick Reference Guide

This document is intended as an aide-mémoire only and should be read in conjunction with the guidance document.
Contents

1a) Health Clearance for new HCW: Identification of ‘new healthcare workers’

1b) Health Clearance for HCW performing EPP/working in exposure prone environments

1c) Standard Health Clearance

2a) Guidance for hepatitis B infected Healthcare Workers: Initial health clearance

2b) Guidance for hepatitis B infected Healthcare Workers: Occupational health monitoring for HCW performing EPP/clinical duties in renal units

3) Guidance for hepatitis C infected Healthcare Workers

4a) Guidance for HIV infected Healthcare Workers: Initial health clearance

4b) Guidance for HIV infected Healthcare Workers: Occupational health monitoring for HCW performing EPP
Does the individual fall into one or more of the following categories:
• A HCW working in the NHS or independent sector for the first time.
• An existing HCW moving to a post/training that involves EPP for first time in their career.
• A HCW returning to work in the NHS, who may have been exposed to BBV while away.\(^1\)

**Yes**

Will HCW carry out EPP or are they unlikely to perform EPP but likely to practice in an exposure prone environment?\(^2\)

**No**

**Yes**

Will HCW carry out clinical duties in renal units?\(^3\)

---

**Standard health clearance applies.**
(Part C; Quick reference 1c)

---

**Additional health clearance applies.**
(Part C; Quick reference 1b)

---

**Explanatory notes**

\(^1\)The need for additional health checks for a HCW returning to work in the NHS should be based on a risk assessment, which should be carried out by the occupational health service. Examples of HCWs who might be considered ‘returners’ include those returning from research experience (including electives spent in countries of high prevalence for BBVs), voluntary service with medical charities, sabbaticals (including tours of active duty in the armed forces), exchanges, locum and agency work or periods of unemployment spent outside the UK.

\(^2\)Staff working in exposure prone environments include frontline paramedics and emergency technicians.

\(^3\)Staff working in renal units require clearance for HBV only.
1b) Health Clearance for HCW performing EPP/working in exposure prone environments (Chapter 8)

- The decision to clear individual HCWs to undertake EPPs is the responsibility of the consultant occupational physician in consultation with the treating physician. UKAP may be consulted on the application of the policy, as needed.
- Those commissioning tests to assess the BBV status of HCWs/monitor effectiveness of treatment should ensure that identified and validated samples (IVS) are used. Testing should be undertaken by a CPA/UKAS accredited laboratory.
- This flowchart is intended as an aide-mémoire only and should be read in conjunction with the guidance document.
- In the case of any HCW diagnosed with hepatitis B, hepatitis C or HIV, a local risk assessment may be required to identify any patient population who has been at a distinct risk of exposure to the blood of a BBV infected HCW (see chapter 14).

HCW deemed to require additional health clearance

**Test for Hep B s Antigen (for those performing EPP / working in exposure prone environments or performing clinical duties in renal units)**

- Hep B s Antigen negative:
  - No restrictions from performing clinical duties
  - Offer HBV immunisation and monitor response
  - Previous Hep B infection with natural immunity
  - Immune through vaccination (Hep B s Antibody ≥10 mIU/mL)
  - Seek advice of virologist/clinical microbiologist
  - No further OH monitoring required

- Hep B s Antigen positive:
  - Declines HBV vaccine OR HBV vaccine is contraindicated OR vaccine ‘Non-responder’ (anti-HBs <10 mIU/mL)
  - Continued clearance dependent on annual testing for Hep B s Antigen.
  - See guidance document (Chapter 10: Quick reference 2a)
  - If found to be Hep B s Antigen positive on annual monitoring, a full risk assessment should be triggered (see Chapter 13). A PNE may be indicated.

**Test for Hep C antibody (for those performing EPP/working in exposure prone environments)**

- Hep C Antibody negative:
  - Can be cleared for EPP

- Hep C Antibody positive:
  - Test for Hep C RNA (at a CPA accredited UK lab, sensitive to 50IU/mL or less)
    - Hep C RNA negative:
      - No restrictions from performing EPPs
    - Hep C RNA positive:
      - See guidance document (Part D; Quick Reference 3)

**Test for HIV antibody (for those performing EPP/working in exposure prone environments)**

- HIV Antibody negative:
  - No restrictions from performing EPPs

- HIV Antibody positive:
  - See guidance document (Part D, Quick reference 4a)
HCW deemed to require standard health clearance

HBV vaccination
Offer immunisation against hepatitis B and tests to check their response to immunisation, including investigation of non-response.
Guidance on immunisation against hepatitis B, which includes information about dosage, protocols and supplies, is contained in Chapter 18 of the UK Health Departments’ publication, Immunisation against infectious disease.
A positive Hep B s Antigen test, declining a vaccination for HBV, or non-response to vaccine should not affect the employment or training of HCWs who will not perform EPPs/perform clinical duties in renal units.

Testing for HCV antibody
Offer a pre-test discussion and an HCV antibody test (and if positive, an HCV RNA test), in the context of their professional responsibilities.
Being hepatitis C positive, or declining a test for hepatitis C, will not affect the employment or training of HCWs who will not perform EPPs.

Testing for HIV
Offer an HIV antibody test with appropriate pre-test discussion, including reference to their professional responsibilities.
Being infected with HIV, or declining a test for HIV, will not affect the employment or training of HCWs who will not perform EPPs.
Occupational health physicians should, however, consider the impact of HIV positivity on the individual’s resistance to infection when advising on suitability for particular posts.

Restrictions on practice for HCW who do not perform EPP or work in exposure prone environments
HCW infected with either hepatitis B, hepatitis C or HIV who do not perform EPP do not require ongoing occupational health supervision.
They should, however, remain under regular medical supervision in accordance with good practice, and should follow appropriate occupational health advice, especially if their circumstances change.

• This flowchart is intended as an aide-mémoire only and should be read in conjunction with the guidance document.
• All HCWs, including students who have direct contact with blood, blood-stained body fluids or patient's tissues, should be offered the following
For HCWs who will perform EPPs/work in an exposure prone environment or perform clinical duties in renal units:

- The decision to clear individual HCWs to undertake EPPs is the responsibility of the consultant occupational physician in consultation with the treating physician. UKAP may be consulted on the application of the policy, as needed.

- Those commissioning tests to assess the BBV status of HCWs/monitor effectiveness of treatment should ensure that identified and validated samples (IVS) are used. Testing should be undertaken by a CPA/UKAS accredited laboratory.

- This flowchart is intended as an aide-mémoire only and should be read in conjunction with the guidance document.

- In the case of any HCW diagnosed with hepatitis B, hepatitis C or HIV, a local risk assessment should be undertaken to identify any patient population who has been at a distinct risk of exposure to the blood of a BBV infected HCW (see Chapter 14).

### New or existing Hep B s Antigen positive HCW

1. **Blood test for Hep B e Antigen**
   - **Hep B e Antigen negative**
     - Establish **pre-treatment** viral load (Hep B DNA; IVS from CPA/UKAS accredited lab)
       - Pre-treatment Hep B DNA <20,000 IU/mL
         - Establish **current** viral load (Hep B DNA)
           - Hep B DNA <200IU/mL due to natural suppression OR 12 months after stopping a course of therapy
             - No restrictions from performing EPPs/working in an exposure prone environment on the condition that:
               - HCW’s viral load is <200IU/mL.
               - Monitored **every 12 months** by consultant occupational physician.
           - Hep B DNA <200IU/mL while on treatment
             - No restrictions from performing EPPs/working in an exposure prone environment on the condition that:
               - HCW is on **continuous antiviral therapy**.
               - HCW’s viral load is **suppressed to <200IU/mL**.
               - Monitored **every 12 weeks** by consultant occupational physician.
           - Hep B DNA ≥200IU/mL-20,000IU/mL, either while on treatment or not on treatment
             - See Occupational Health Monitoring for HBV-infected HCW (Part D Chapter 9; Quick reference 2b).
         - Unknown pretreatment Hep B DNA, or derived from non-IVS
           - Establish current viral load & treatment status and consult UKAP.
             - Hep B DNA <200IU/mL due to natural suppression OR 12 months after stopping a course of therapy
               - No restrictions from performing EPPs/working in an exposure prone environment on the condition that:
                 - HCW’s viral load is <200IU/mL.
                 - Monitored **every 12 months** by consultant occupational physician.
             - Hep B DNA <200IU/mL while on treatment
               - No restrictions from performing EPPs/working in an exposure prone environment on the condition that:
                 - HCW is on **continuous antiviral therapy**.
                 - HCW’s viral load is **suppressed to <200IU/mL**.
                 - Monitored **every 12 weeks** by consultant occupational physician.
             - Hep B DNA ≥200IU/mL-20,000IU/mL, either while on treatment or not on treatment
               - Two IVS taken no less than 4 weeks apart with both showing HBV DNA<200IU/mL are required for giving health clearance and allowing the HCW to commence EPP activities.
           - Hep B DNA ≥200IU/mL-20,000IU/mL, either while on treatment or not on treatment
             - No restrictions from performing EPPs/working in an exposure prone environment on the condition that:
               - HCW’s viral load is <200IU/mL.
               - Monitored **every 12 months** by consultant occupational physician.
           - Pre-treatment Hep B DNA ≥20000IU/mL
             - HCW should be restricted from performing EPP/working in an exposure prone environment / clinical duties in a renal unit
               - No further OH monitoring required while not performing EPP.
       - No restrictions from performing EPPs/working in an exposure prone environment on the condition that:
         - HCW’s viral load is <200IU/mL.
         - Monitored **every 12 months** by consultant occupational physician.
   - **Hep B e Antigen positive**

---

**Explanatory notes**

1. In some cases, the pre-treatment viral load may also be the current viral load.
2. Pre-treatment viral loads are acceptable geq/ml and that these should not be converted to IU/ml.
3. Pre-treatment levels of <10^3 geq/mL, and on-treatment levels between 10^9 and 10^6 geq/mL are acceptable.
4. HCW who have Hep B DNA>200-20,000IU/mL at initial assessment will need to achieve viral suppression before giving health clearance.
5. Two IVS taken no less than 4 weeks apart with both showing HBV DNA<200IU/mL are required for giving health clearance and allowing the HCW to commence EPP activities.
For HCWs cleared to perform EPPs/work in exposure prone environments or perform clinical duties in renal units
- The decision to clear individual HCWs to undertake EPPs is the responsibility of the consultant occupational physician in consultation with the treating physician. UKAP may be consulted on the application of the policy, as needed.
- Those commissioning tests to assess the BBV status of HCWs/monitor effectiveness of treatment should ensure that identified and validated samples (IVS) are used. Testing should be undertaken by a CPA/UKAS accredited laboratory.
- This flowchart is intended as an aide-mémoire only and should be read in conjunction with the guidance document.
- In the case of any HCW diagnosed with hepatitis B, hepatitis C or HIV, a local risk assessment should be undertaken to identify any patient population who has been at a distinct risk of exposure to the blood of a BBV infected HCW (see Chapter 14).

### Occupational health monitoring of Hep B-infected HCW

- **Hep B DNA <200 IU/mL either from natural suppression, or 12 months after stopping a course of antiviral therapy.**
  - Hep B DNA tested annually\(^1\)
    - Hep B DNA <200 IU/mL
    - Hep B DNA >200 IU/mL

- **Hep B-infected HCW on continuous antiviral therapy with Hep B DNA <200 IU/mL**
  - Where a HCW does not attend for test/attends but refuses to have viral load tested, HCW should be restricted from EPP until it is established that they have an up to date viral load <200 IU/mL\(^3\).
  - Hep B DNA tested every 12 weeks\(^2\)
    - Hep B DNA >200 IU/mL
    - Hep B DNA <200 IU/mL

If HepB DNA
- >200 IU/mL but < 400 IU/mL, further tests on the same specimen if sufficient volume or a further specimen by a designated laboratory\(^4\) to verify the result. If the laboratory confirms the count is above the cut off, the HCW should cease performing EPPs until their viral load returns to being stably below 200 IU/mL\(^4\).
- 400 IU/mL or above, the HCW should cease conducting EPPs immediately, and remain unable to perform EPPs until their viral load returns to being stably below 200 IU/mL

- A full risk assessment should be triggered\(^5\). A PNE may be indicated.

- Report action taken as a result of increased viral load to UKAP-OHR register.

### Explanatory notes

1. Annual viral load testing can be performed no earlier than 50, and no later than 54 complete calendar weeks after the date of the preceding specimen taken for occupational health monitoring purposes.
2. Quarterly viral load testing can be performed no earlier than 10, and no later than 14 complete calendar weeks after the date of the preceding specimen taken for occupational health monitoring purposes.
3. The designated laboratories are the West of Scotland Specialist Virology Centre (tel: 0141 2018722) and the Public Health Laboratory Birmingham (0121 4242000).
4. Resumption of EPP activities following a period of interruption (for whatever reason) requires at least two IVS Hep B DNA <200 IU/mL, no less than 4 weeks apart.
5. Guidance on performing a local risk assessment can be found in chapter 14.
3) Guidance for Hepatitis C infected Healthcare Workers (Chapter 11)

- The decision to clear individual HCWs to undertake EPPs is the responsibility of the consultant occupational physician in consultation with the treating physician. UKAP may be consulted on the application of the policy, as needed.
- Those commissioning tests to assess the BBV status of HCWs/monitor effectiveness of treatment should ensure that identified and validated samples (IVS) are used. Testing should be undertaken by a CPA/UKAS accredited laboratory.
- This flowchart is intended as an aide-mémoire only and should be read in conjunction with the guidance document.
- In the case of any HCW diagnosed with hepatitis B, hepatitis C or HIV, a local risk assessment should be undertaken to identify any patient population who has been at a distinct risk of exposure to the blood of a BBV infected HCW (see chapter 14).

**New or existing Hep C RNA positive HCW**

- **HCW should be restricted from carrying out EPP.**
- **Test for Hep C RNA at least 6 months after cessation of treatment**
- **Hep C RNA positive**
  - HCW should be restricted from carrying out EPP.
  - Consult UKAP for advice on return to EPP after repeated treatment
- **Hep C RNA negative**
  - HCW can return to perform EPP.
  - Test for Hep C RNA 6 months after initial RNA negative test
- **Hep C RNA negative**
  - No restrictions from performing EPPs/working in an exposure prone environment.
  - No further OH monitoring required. However, risk assessment may be required if any evidence of recrudescence at a later stage.
- **Hep C RNA positive**
  - HCW should be restricted from carrying out EPP.
  - A full risk assessment should be triggered. A PNE may be indicated.
  - Consult UKAP for advice on return to EPP after repeated treatment

**Services provided outside of Occupational Health Services**

- **Referral for clinical follow up for consideration of antiviral treatment as appropriate**
- **Consider referral to Occupational Health Services for clearance to perform if sustained viral response achieved following a course of treatment.**

**Explanatory notes**

1. In the case of a HCW who spontaneously clears HCV and wishes to perform/return to EPP, advice should be sought from UKAP.
2. Guidance on performing a local risk assessment can be found in section 14.
3. Guidance on performing a local risk assessment can be found in chapter 14.
**4a) Guidance for HIV infected Healthcare Workers: Initial health clearance (Chapter 12)**

- For HCWs cleared to perform EPPs/work in exposure prone environments
- The decision to clear individual HCWs to undertake EPPs is the responsibility of the consultant occupational physician in consultation with the treating physician. UKAP may be consulted on the application of the policy, as needed.
- Those commissioning tests to assess the BBV status of HCWs/monitor effectiveness of treatment should ensure that identified and validated samples (IVS) are used. Testing should be undertaken by a CPA/UKAS accredited laboratory.
- This flowchart is intended as an aide-mémoire only and should be read in conjunction with the guidance document.
- In the case of any HCW diagnosed with hepatitis B, hepatitis C or HIV, a local risk assessment should be undertaken to identify any patient population who has been at a distinct risk of exposure to the blood of a BBV infected HCW (see chapter 14).

### New or existing HCW infected with HIV

- **Is the HCW an elite controller?**
  - **Yes**
    - Refer to UKAP
  - **No**
    - **Is HCW on effective combination anti-retroviral therapy (cART)?**
      - **Yes**
        - Test HIV plasma viral load
          - **<200 copies/mL**
            - No restrictions from performing EPPs/working in an exposure prone environment on the condition that:
              - HCW is subject to plasma viral load monitoring every 12 weeks;
              - HCW is registered with UKAP-OHR (see chapter 9)
          - **≥200 copies/mL**
            - HCW should be restricted from carrying out EPP.
      - **No**
    - **HCW should be restricted from carrying out EPP.**

---

**Explanatory notes**

1. An elite controller is defined as a person living with HIV who is not receiving antiretroviral therapy and who has maintained their viral load below the limits of assay detection for at least 12 months, based on at least three separate viral load measurements.
2. For the purposes of initial health clearance, no less than 12 weeks apart is defined as between 12 and 16 complete calendar weeks.
3. Quarterly viral load testing can be performed no earlier than 10, and no later than 14 complete calendar weeks after the date of the preceding specimen taken for occupational health monitoring purposes.
• For HCWs cleared to perform EPPs/work in exposure prone environments
• The decision to clear individual HCWs to undertake EPPs is the responsibility of the consultant occupational physician in consultation with the treating physician. UKAP may be consulted on the application of the policy, as needed.
• Those commissioning tests to assess the BBV status of HCWs/monitor effectiveness of treatment should ensure that identified and validated samples (IVS) are used. Testing should be undertaken by a CPA/UKAS accredited laboratory.
• This flowchart is intended as an aide-mémoire only and should be read in conjunction with the guidance document.
• In the case of any HCW diagnosed with hepatitis B, hepatitis C or HIV, a local risk assessment should be undertaken to identify any patient population who has been at a distinct risk of exposure to the blood of a BBV infected HCW (see chapter 14).

Explanatory notes
1 Quarter viral load testing can be performed no earlier than 10, and no later than 14 complete calendar weeks after the date of the preceding specimen taken for occupational health monitoring purposes.
2 Resumption of EPP activities following a period of interruption (for whatever reason) requires at least two viral loads <200 copies/mL, no less than 12 weeks apart.
3 The significance of any increase in plasma viral load above 200 copies/mL and below 1000 copies/mL, should be assessed jointly by the OH and treating physicians with input from appropriate local experts.
4 Guidance on performing a local risk assessment can be found in chapter 14.

Report any actions taken as a result of increased viral load to UKAP-OHR register.