



**LEE VALLEY REGIONAL PARK AUTHORITY**  
**AUTHORITY MEETING**  
**30 APRIL 2015 AT 14:00**

**Agenda Item No:**

**5**

**Report No:**

**A/4208/15**

## **CONTAMINATED LAND STRATEGY UPDATE**

Presented by the Head of Property Services

### **SUMMARY**

Over the last 5 years Members have noted and approved a number of papers taking the Authority through the formation of a Contaminated Land Policy Statement and Strategy and a wide range of studies on sites in Authority ownership. It was agreed to establish a Contaminated Land Working Group to guide the progression of work and to report back to Executive Committee

At the Executive Committee meeting of 26 March 2015 (paper E/399/15) Members approved an updated Contaminated Land Strategy for submission to Authority. This report seeks approval of the updated Contaminated Land Strategy.

### **RECOMMENDATIONS**

- Members Approve:           (1) adoption of the updated Contaminated Land Strategy attached as Appendix A to this report; and
- Members Note:               (2) the next steps required to progress the action plan.

### **BACKGROUND**

- 1 The Lee Valley contains a legacy created by a variety of land uses some of which have resulted in extensive areas of land contamination. These land uses have ranged from industrial processes, such as those associated with the munitions industries, to a wide range of land fill. The nature of the Valley and the recognition that the Regional Park had to address this issue was taken into account in the Lee Valley Regional Park Act 1966 that formally established both the Regional Park and the Authority.
- 2 Members are aware that the Authority owns significant areas of land which have been deemed contaminated by virtue of the fact that they have historically received infill or were used for industrial processes that have contaminated the land to varying degrees. There may also be other sites which have not as yet

been investigated but could well fall into this category. This was highlighted as part of the Authority's Risk Register and work was undertaken to initially formulate a Contaminated Land Policy Statement which would lead to a Contaminated Land Draft Strategy.

- 3 At the Authority Meeting held on 20 October 2011 (paper A/4130/11) Members approved the adoption of a draft Contaminated Land Policy Statement, noted the progress being made in the production of a Contaminated Land Draft Strategy for the Authority and approved the establishment of a Task and Finish Group (Contaminated Land Working Group) to examine the findings and recommendations of Phase 1 studies and consider a draft strategy and action plan.
- 4 At the Authority meeting held on 25 October 2012 (paper A/4152/12) Members approved the adoption of a Contaminated Land Strategy Framework and noted the next steps required to progress the action plan.
- 5 The Executive Committee meeting of 23 January 2014 (paper E/331/14) approved the Contaminated Land Working Group's proposal of 9 December 2013 (paper CON/03/13) that the Contaminated Land Strategy document be revised to reflect a more pragmatic approach for sites where the risk is concluded to be low or moderate to low to only seek to review sites should their usage pattern be about to change, if an issue occurs which raised concern, or if development either on the site or a nearby site is proposed.
- 6 Of the 16 sites which were originally identified as possibly being affected by land contamination, 12 are considered to present a low or moderate to low risk and therefore in future will be treated in accordance with the updated Contaminated Land Strategy. For the 4 remaining sites (Stanstead Innings, East Hale Allotments, Nazeing Marshes and Spitalbrook) where the risk is concluded to be moderate or high, further environmental assessment will be undertaken, in accordance with the updated Contaminated Land Strategy.
- 7 The Contaminated Land Strategy was provided by external consultants acting on behalf of the Authority. In order to update this strategy following the approach agreed by the Executive Committee it was necessary to liaise with the external consultants. For a variety of unrelated reasons including a change of personnel this has taken longer than anticipated. The updated Contaminated Land Strategy, attached as Appendix A to this report, was approved by the Executive Committee on 26 March 2015 and is now submitted for adoption by Authority.

#### **ORIGINAL CONTAMINATED LAND STRATEGY**

- 8 The original Contaminated Land Strategy was based on those adopted by local authorities but also reflected the Authority's unique position.
- 9 The strategy proactively adopted the guidelines set out in the Environmental Protection Act 1990 applicable to local authorities, and whilst the Authority is not a local authority it has previously taken the approach, as here, in adopting guidance required of local authorities in their preparation of plans and policies.
- 10 The strategy mirrored guidance laid out under the Environmental Protection Act 1990 and Contaminated Land (England) Regulations 2000 and other non-statutory guidance.

- 11 No formal mechanism was in place for external approval of the strategy but it was forwarded to the Environment Agency for comment.

#### **UPDATED CONTAMINATED LAND STRATEGY**

- 12 The Environmental Protection Act 1990 has been revised, together with other relevant legislation. These changes do not materially affect the process used for contaminated land assessment, however changes have been made to the definition of contaminated land and to how contaminated land is dealt with in the planning system.
- 13 The updated strategy includes:
- Introduction;
  - Background with priority categories and a review of the Authority's contaminated land holdings under the priority categories; and
  - Future Approach.
- 14 The updated strategy fits within the contaminated land policies issued by the various riparian authorities. Whilst each of the 9 authorities across the Regional Park has different contaminated land policies they all follow the same broad approach.

#### **NEXT STEPS**

- 15 Subject to approval of the updated strategy, further environmental assessment will be undertaken of the 4 sites concluded to be moderate or high risk. This includes intrusive testing with sample analysis, and the findings will determine the extent of remediation or controls for access to lower their risk assessments to an acceptable level. This exercise has been tendered and an order is anticipated to be placed imminently. The results of this testing will be brought back to Members of the Contaminated Land Working Group for consideration.
- 16 For any other sites assessed in the future the same process would be adopted, i.e., consideration and implementation of a blend of solutions from site security to remediation until the risk was reduced to medium to low or below.

#### **ENVIRONMENTAL IMPLICATIONS**

- 17 The environmental implications arising directly from the recommendations in this report are included within the body of the report.

#### **FINANCIAL IMPLICATIONS**

- 18 The potential cost of further environmental assessment has not been established at this stage. Once this has been established consideration will need to be given to funding this and any ongoing monitoring requirements.

#### **HUMAN RESOURCE IMPLICATIONS**

- 19 There are no human resource implications arising directly from the recommendations in this report.

**LEGAL IMPLICATIONS**

- 20 Upon adoption the strategy will become a Policy document and the Authority will, under the Lee Valley Regional Park Act 1966, have a duty to manage and preserve its land holdings such that the strategy policy is implemented.

**RISK MANAGEMENT IMPLICATIONS**

- 21 There is no risk free way of dealing with contaminated land issues and the Authority could still be open to challenge in the future. However adoption of the updated strategy provides a process under which the Authority can manage the risk to human health or to controlled waters within the Park.
- 22 The strategic Risk Register includes SR7 – Environmental damage/disaster – and the risk score will be reassessed subject to adoption of the updated strategy and as part of the review of the Risk Register which was highlighted at the recent Audit Committee in February.

**EQUALITY IMPLICATIONS**

- 23 There are no equality implications arising directly from the recommendations in this report.

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**PREVIOUS COMMITTEE REPORTS**

Executive Committee	E/399/15	Contaminated Land Strategy Update	26 March 2015
Executive Committee	E/331/14	Contaminated Land – Next Stages	22 Jan 2014
Authority	A/4154/12	Contaminated Land Strategy	25 Oct 2012
Executive Committee	E/234/12	Contaminated Land Strategy	20 Sept 2012
Contaminated Land Working Group	CON/01/12	Contaminated Land Draft Strategy	23 Feb 2012
Authority	A/4130/11	Contaminated Land Policy Statement	20 Oct 2011
Executive Committee	E/154/11	Contaminated Land Update	8 Sept 2011
Executive Committee	E/23/09	Funding for Land Study	19 Nov 2009

**APPENDIX ATTACHED**

Appendix A Updated Contaminated Land Strategy

**PARSONS  
BRINCKERHOFF**

November 2014



LEE VALLEY REGIONAL PARK  
AUTHORITY  
UPDATED CONTAMINATED LAND  
STRATEGY

*Lee Valley Regional Park Authority*

973901

**Issue 6**

# **Lee Valley Regional Park Authority Updated Contaminated Land Strategy**

**973901**

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**LIST OF ABBREVIATIONS**

CLR11	Contaminated Land Report 11
EPA	Environmental Protection Act (1990)
LVRP	Lee Valley Regional Park
LVRPA	Lee Valley Regional Park Authority
NFA	No Further Action
NPPF	National Planning Policy Framework
PAH	Poly Aromatic Hydrocarbons
PPS	Planning Policy Statement
SPOSH	Significant Possibility of Significant Harm



**EXECUTIVE SUMMARY**

<p><b>Introduction</b></p>	<p>Lee Valley Regional Park Authority (LVRPA) commissioned Parsons Brinckerhoff to revise the 2012 Contaminated Land Strategy Framework (Ref. Lee Valley Regional Park Authority Contaminated Land Strategy Framework July 2012 97390A, hereinafter referred to as the '2012 Strategy') in light of work done under the 2012 strategy and recommendations of the LVRPA contaminated land working group in December 2013.</p>
<p><b>Background</b></p>	<p>It is known that the Lee Valley Regional Park contains a legacy created by a variety of land uses some of which have resulted in extensive areas of potential land contamination. The LVRPA originally identified sixteen sites that could be affected by land contamination.</p> <p>In 2012 the LVRPA undertook a review and prioritisation of its potentially contaminated landholding. A proactive approach was set out in the 2012 Strategy that followed a tiered assessment process. The available information for sixteen sites was reviewed and the sites were prioritised based on perceived levels of risk.</p> <p>Further studies have been completed over the intervening period on those sites concluded to have the greatest potential for unacceptable risk.</p> <p>Based on the findings of this work, twelve of the sixteen sites were considered to present a low or moderate to low risk to the identified receptors.</p>
<p><b>Proposed Strategy</b></p>	<p>The LVRPA Contaminated Land Working Group has adopted an approach that No Further Action will be taken on sites where the risk is concluded to be low or moderate to low. This is considered to be in accordance with their obligations under the EPA, as such sites are unlikely to be determined as contaminated land by the relevant Riparian Authority.</p> <p>For the remaining four moderate to high risk sites, further environmental assessment is to be undertaken in accordance with CLR11 and statutory guidance.</p> <p>For all sites, the risk levels posed by land contamination will be reviewed if any changes to land use or amenity values are proposed. For significant levels of development, this assessment will proceed through the planning framework.</p>
<p>This sheet is intended as a summary only</p>	

- 1 INTRODUCTION**
- 1.1 Terms of Reference**
- 1.1.1 Lee Valley Regional Park Authority (LVRPA) commissioned Parsons Brinckerhoff to revise the 2012 Contaminated Land Strategy Framework (Ref. *Lee Valley Regional Park Authority Contaminated Land Strategy Framework July 2012 97390A, hereinafter referred to as the '2012 Strategy'*) in light of work done under the 2012 strategy and recommendations of the LVRPA contaminated land working group in December 2013.
- 1.1.2 The review has been undertaken in accordance with the proposal dated 27<sup>th</sup> February 2014.
- 1.2 Aims and Objectives**
- 1.2.1 The objective of this review is to provide an update to the 2012 Strategy to incorporate the following:
- Information obtained on each of the site from the environmental assessments completed to date;
  - Findings of the LVRPA Contaminated Land Working Group (meeting minutes ref. CON/03/13, dated 9<sup>th</sup> December 2013); and
  - A summary of changes to statutory guidance and associated impacts on land holders.
- 1.2.2 It is not intended to replace the 2012 Strategy. Rather, this update will reflect a change in the approach taken based on the findings of the work completed to date. This change reflects the LVRPA's obligations as a land owner under the revised statutory guidance.
- 1.3 Limitations**
- 1.3.1 Parsons Brinckerhoff has prepared this strategy for the sole use of the LVRPA in accordance with generally accepted consulting practices, and for the intended purposes as stated in the agreement under which this work was completed. This report may not be relied upon by any other party without the explicit written agreement of Parsons Brinckerhoff. No other third party warranty, expressed or implied, is made as to the professional advice included in this strategy.
- 1.3.2 This strategy should be followed and used in its entirety.

## 2 BACKGROUND

### 2.1 Lee Valley Park Contaminated Land Situation - 2012

2.1.1 It is known that the Lee Valley Regional Park (LVRP) contains a legacy created by a variety of land uses some of which have resulted in extensive areas of potential land contamination. The Lee Valley Regional Park Authority (LVRPA) has identified sixteen sites that may be affected by land contamination.

2.1.2 As such, in 2012 the LVRPA undertook a review and prioritisation of its potentially contaminated landholding. A proactive approach was set out in the 2012 Strategy that followed a tiered assessment process. The available information for the sixteen sites was reviewed and the sites were prioritised based on perceived levels of risk.

2.1.3 Further studies have been completed over the intervening period on those sites concluded to have the greatest potential for unacceptable risk.

### 2.2 Changes in Contaminated Land Statutory Guidance

2.2.1 The 2012 Strategy was produced based on the Environmental Protection Act (EPA, 1990) and Planning Policy Statement 23 (PPS23). Both of these documents have now been revised, with PPS23 rescinded and replaced with the National Planning Policy Framework (NPPF). These changes do not materially affect the process used for contaminated land assessment. However, changes have been made to the definition of contaminated land and to how contaminated land is dealt with in the planning system.

2.2.2 The revised statutory guidance sets out four categories of land contamination. These categories, along with typical descriptions, are set out below:

- **Category 1:** Includes sites that are comparable to locations where significant harm has been caused, or is strongly suspected, where similar exposure has caused significant harm elsewhere or if significant harm has already occurred.
- **Category 2:** Includes sites where a strong case can be made that a significant possibility of significant harm (SPOSH) is present, even in the absence of analogous sites. Can include sites where the Local Authority deems actions to be taken on a precautionary basis.
- **Category 3:** Includes sites where no strong case for the presence of SPOSH can be made. The risks posed by land contamination may not be low, but may fall short of justifying Local Authority intervention.
- **Category 4:** The lowest risk level, where the risk of significant harm is low. This category would include sites where no contaminant linkages have been established or where concentrations of contaminants is 'normal'.

2.2.3 Sites that are assessed as being within either Category 1 or 2 would be determined as contaminated land under Part 2A of the EPA (1990). The LVRPA's principal duty as landholder is to ensure that its sites could not be determined as contaminated land.

2.2.4 It is noted that this strategy is written to allow the LVRPA to manage its current landholdings. As such, changes within the planning system have not been detailed.

Should the LVRPA wish to change the site usage, either within or without the planning system, then the assessment contained herein must be reviewed.

### 2.3 Priority Categories

2.3.1 The overall level of risk posed by contaminants at a site to identified receptors has been summarised based on the work completed to date. The assessment is based on retention of the current site use and amenity level.

**Table 2.1 – Risk Levels**

Risk Level	Typical Characteristics
High	Contaminant linkage is present or likely to be present, and is currently, or is probable to, causing harm. Risks would include chronic or acute risk to human health and pollution of sensitive water receptors.
Moderate	Includes sites where severe harm is possible (e.g. acute human health risk or major pollution of water receptor) to sites where there is a probable chronic risk to human health and controlled waters.
Moderate to low	Includes sites where severe harm is possible, but unlikely, to sites where it's probable that minor harm (limited to non-sensitive receptors). <sup>1</sup>
Low	Situations where harm to human health or waters receptors is unlikely, or where harm would be limited to non-sensitive receptors.

2.3.2 The high, moderate and low risk categories do not directly equate to the categories set out in the revised EPA (1990).

### 2.4 LVRPA Site Summary

2.4.1 The following table gives an indication of the current priority for the sites investigated to date.

2.4.2 The priority is based on existing information at the time of writing and based on the site use and amenity levels remaining unchanged.

**Table 2.2 Current Risk Category**

Site	Priority category
Britannia Lake	Moderate to low risk concluded. LVRPA Contaminated Land Working Group concluded that no further action is required.
Stanstead Innings	Moderate risk to human health based on the presence of asbestos shallow soils across parts of the site



Table 2.2 Current Risk Category

Site	Priority category
Glen Faba	Moderate to low risk concluded. LVRPA Contaminated Land Working Group concluded that no further action is required.
Tottenham Marshes	Moderate to low risk concluded for controlled waters and low risk concluded for human health. LVRPA Contaminated Land Working Group concluded that no further action is required.
East Hale Allotments	Moderate risk to human health based on cadmium and PAH compounds
Ramney Marshes	Low risk concluded based on lack of access to Ramney Marsh West and light usage of Ramney Marsh East. LVRPA Contaminated Land Working Group concluded that no further action is required.
Nazeing Marshes	Moderate risk due to presence of asbestos, metals and PAH compounds in soils
Gwendoline	Moderate to low risk identified based on current access and use. LVRPA Contaminated Land Working Group concluded that no further action is required.
Hayes Hill Farm	Low risk due to hardstanding. LVRPA Contaminated Land Working Group concluded that no further action is required.
Picketts Lock	Moderate to low risk based on desk top information and lack of absence. LVRPA Contaminated Land Working Group concluded that no further action is required.
Spitalbrook	Moderate high risk identified, based on risk to controlled waters and human health.
St Paul's Field	Moderate to low risk based on current use. LVRPA Contaminated Land Working Group concluded that no further action is required.
Glenholme	Moderate to low risk based on current use. LVRPA Contaminated Land Working Group concluded that no further action is required.
Gunpowder Park	Low risk based on on-going containment. LVRPA Contaminated Land Working Group concluded that no further action is required.
Leyton Marsh	Low risk to human health. LVRPA Contaminated Land Working Group concluded that no further action is required.
Broxbourne Airfield	Low risk. LVRPA Contaminated Land Working Group concluded that no further action is required.

### 3 FUTURE APPROACH

#### 3.1 Introduction

3.1.1 The 2012 Strategy adopted a proactive approach to risk assessment. Under this strategy, the identified sites were prioritised and investigated. The results of the work completed to date have been presented in Table 2.2.

3.1.2 Given the large amount of data now available on the portfolio, the 2012 Strategy's proactive approach is to be revised.

#### 3.2 Proposed Strategy

3.2.1 The works completed to date indicate that, of the sixteen sites investigated, twelve are considered to present a low or moderate to low risk to the identified receptors. In terms of the statutory definition of contaminated land, it is considered that these sites would fall within Category 4 or possibly Category 3. As such, they are considered unlikely to be determined as contaminated land by the relevant Riparian Authorities.

3.2.2 Therefore, the LVRPA Contaminated Land Working Group has taken a decision that sites that present a low or moderate to low risk do not need to be subject to further study.

3.2.3 For sites where the risk is concluded to be moderate or high, further environmental assessment will be undertaken. This applies to Stanstead Innings, East Hale Allotments, Nazeing Marshes and Spitalbrook.

3.2.4 These sites will continue to be assessed in line with CLR11 and the relevant statutory and non-statutory guidance. The results of further investigation will either confirm that the sites are suitable for their on-going use, or that remedial actions are required to reduce the risk. These may include source removal, or a change in the use of the site.

3.2.5 If remedial actions were deemed necessary for any site then, following internal review and agreement, the LVRPA should undertake consultations, as deemed appropriate, with other relevant stakeholders such as the Environment Agency, the Food Standards Agency, Natural England, the Health and Safety Executive (HSE), and Defra, as well as neighbouring riparian authorities and other local interest groups.

3.2.6 The purpose of these consultations will be both to receive input from the consultees and to inform them of LVRPA's intentions

3.2.7 Should the use or amenity value of any sites be subject to change then these assessments must be revised. For large-scale land use changes, this review will be driven by the NPPF through the planning process. However, it should be noted that, for some sites, the low or moderate to low risk ratings have been applied based on land use criteria such as lack of access, vegetation levels etc. Changes in these, to facilitate new amenity for example, could have a substantial effect on the risk rating.

3.2.8 Review of No Further Action (NFA) sites will now only be progressed should their usage pattern change, if an issue occurs which raises concern, or if development either on the site or a nearby site is proposed.

3.2.9 This revised strategy fits within the contaminated land policies issued by the various Riparian Authorities. Whilst each of the nine Authorities across the LVRP has different contaminated land policies, they all follow the same broad approach.

- 3.2.10 Local Authorities will look to deal with contaminated land during development. This is typically managed through the planning process or through building regulations. This is consistent with LVRPAs approach to reassess sites if and when the proposed end use changes.
- 3.2.11 Local Authorities look to minimise the financial burden of contaminated land investigation and remediation by pursuing voluntary remediation wherever possible. This is considered to be complimentary to the LVRPAs strategy. As set out above, the LVRPA are to continue to investigate sites which may have the potential to be determined as contaminated land on a voluntary basis.
- 3.2.12 This ongoing investigation of those sites not deemed to be moderate to low risk is also complimentary to Local Authority strategies.
- 3.2.13 If approached, LVRPA will provide all available site data to the Local Authority for review within a reasonable timeframe. If such information is not made available within a reasonable timeframe by the LVRPA, then the Local Authority has the powers to enter the site and conduct intrusive works.
- 3.2.14 If the available information on any site indicates that significant contaminant linkages exist, then the Local Authority may delay determining it as contaminated land if the LVRPA presents a case for ongoing remediation.