REMEDIATION COMPLETION REPORT (RCR) CHECKLIST

State Form 54168 (R2 / 5-24)
INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF LAND QUALITY
STATE CLEANUP AND VOLUNTARY REMEDIATION PROGRAMS

INDIANA DEPARTMENT OF
ENVIRONMENTAL MANAGEMENT
Attention: Remediation Services Branch
Office of Land Quality
100 N. Senate Ave., IGCN 1101
Indianapolis, IN 46204-2251
or enroll in IDEM's e-submission portal

INSTRUCTIONS:

1. *The RCR Checklist form should be used to document the completion of remediation activities and to request site closure.*
2. *This form is intended to assist with the organization of the RCR for either the State Cleanup or Voluntary Remediation Program.*
3. *The RCR Checklist should be attached as a cover to your RCR.*
4. *Depending on the nature of the project, some of the following sections in the RCR Checklist may not be applicable. If this is the case, do not leave the section blank, omit, or reorder the checklist items. Instead, enter "Not Applicable" or other explanation to indicate that the section does not apply or that information is not available.*
5. *Submit one electronic copy of the RCR using the Program's e-Submission portal.*

SITE INFORMATION		
Site Name:		
Site Street Address:		
Site City / County / ZIP code:		
Project Program: ☐ State Cleanup ☐ VRP	Site Project Number:	
CONTACT INFORMATION		
Contact Responsible for Remediation Project (SCP Responsible Party or VRP Applicant)		
Name:		
Street Address:		
City:	County:	ZIP Code:
E-mail Address:	Telephone Number:	
Environmental Consultant Information		
Company Name:	Contact Person:	
Street Address:		
City:	County:	ZIP Code:
E-mail Address:	Telephone Number:	
Other Parties copied (Attorney, property owner, etc.)		
Name, title, company, contact information:		

Element	Location in Document
I. INTRODUCTION	
1. Project Information	
Site name, facility ID number(s) and address	
Responsible party/VRP Applicant and contact info	
Site contact person or group responsible for guiding the remediation project and contact info	
Type of facility, including historical summary of site ownership and description of past and current operations	
Overview of the initial discovery of contamination, spill history, investigations conducted at the site, and remediation history	
List of completed reports concerning the site, including VFC #s and a discussion of other pertinent data and documentation available for the site	
2. Site Setting	
Site location and description of the surrounding land-use	
Geologic and hydrogeologic summary	
List of Release Related Chemicals (RRCs) and IDEM guidance being used	
II. REMEDIATION EFFORTS	
3. Remediation Summary	

Description and discussion of overall performance of the remediation method(s) used and activities performed, which may include, if applicable: • a block flow diagram or other conceptual illustration of the system as installed and other major equipment used or installed, • a map showing injection point locations and table(s) showing injected materials and volumes, • a map showing the excavation extent and confirmation sample locations and analytical results	
4. Confirmation Sampling	
<u>If not already submitted to IDEM: The RCR MUST INCLUDE</u> the most recent sampling data and/or remediation confirmation sampling data from the site including sampling procedures, QA/QC samples collected, analytical methods used, analytical data table(s) showing tabulated current and historic data for all affected media and contaminants, confirmation sampling locations on a plan view map, rationale for sampling locations, analytical results figure(s), and laboratory analytical reports and chain-of-custody sheets included in Appendix A. IDEM must be notified prior to confirmation sampling activities. **<u>If this has already been submitted to IDEM, this should NOT be submitted again</u>.**	
Comparison of confirmation sampling results with the RWP-approved cleanup levels	
Comparison to IDEM's split confirmation sample results, if applicable	
Acceptable cleanup criteria for all RRCs and for all affected media	
Demonstration that acceptable cleanup criteria have been met	
5. Conceptual Site Model/Exposure Assessment Evaluation	
Demonstration that all exposure pathways are incomplete on- and off-site and discussion of identified decision units. Discussion of exposure pathways must include those listed below: <u>Surface and Subsurface Soil</u> -Direct Contact -Soil Leaching <u>Groundwater</u> <u>Surface Water</u> <u>Soil Gas</u> -Source identification -Extent delineation <u>Vapor Intrusion</u> -Affected structures -Sewer vapor sampling <u>Ecological Exposure Pathway</u>	
6. Final Site Restoration	
Summary of site restoration work, including the following:	
Description of how disturbed areas have been or will be restored	
Completion schedule for remaining restoration activities	
Description of remediation equipment dismantling and removal, including waste disposal activities	

III. FIGURES	
Included figures should be appropriately scaled and include at minimum:	
Figure 1 – Site Location Map showing township, range, and section on a 7.5-minute quadrangle United States Geological Survey (USGS) topographic map	
Figure 2 – Site Vicinity Map(s) showing the site and surrounding properties and property lines, site buildings, roads, etc.	
Figure 3 – Site Detail Map(s) showing: i. *Site property lines,* ii. *Building outlines,* iii. *Utility lines (on and surrounding the site, including television or communication cables, gas pipes, sewer lines, water pipes, electric lines, storm and sewer drain locations, etc.),* iv. *Known or suspected source areas,* v. *Underground/aboveground storage tank (UST/AST) locations,* vi. *Groundwater monitoring well network,* vii. *Production wells,* viii. *Completed remediation activities, including:* • *Injection locations,* • *Soil excavation boundaries for remediation system equipment (trenches, piping, etc.), and* ix. *Other surface and subsurface features as applicable*	

Figure 4 – Groundwater Flow Map(s) showing groundwater elevations, flow direction(s), and potentiometric surface contours. Provide separate figures for each water bearing zone/aquifer (if applicable)	
Figure 5 – Groundwater Analytical Results Map(s) for RRCs (if applicable)	
Figure 6 – Soil Analytical Results Map(s) for RRCs (if applicable)	
Figure 7 – Vapor Analytical Results Map(s) for RRCs (if applicable)	
Figures 8 & 9 – RRC Plume Map(s) and Geologic Cross Section(s) showing horizontal and vertical extent of RRC contamination. Use separate figures for each RRC. Specify software used to generate contours (if applicable)	

IV. TABLES	
Included tables should be formatted following State Form 57327 – Remediation/Progress Monitoring Cover Sheet and Report Format guidelines and should include (if applicable):	
Table 1 – Current and historic groundwater gauging and groundwater elevation data	
Table 2 – RRC current and historic groundwater analytical results	
Table 3 – RRC current and historic soil analytical results	
Table 4 – RRC current and historic vapor analytical results	
V. APPENDICES	
A. Copies of laboratory analytical reports with chain-of-custody forms (if not already submitted)	
B. Institutional Controls	
1. **IDEM-approved and recorded** ERC text and accompanying exhibits, ERO text and response to ERO Request for Information, and/or Notice of Contamination in Right of Way form	
a. Recorded ERC must include the property deed and exhibits including: A – Legal description of real estate B – Non-aerial image, scaled site map including street names and State Parcel Identification Numbers (PINs), include GPS coordinates (if applicable) C – List or table of RRCs	
b. Soil/Groundwater Management Plan(s)	
C. Engineering Controls	
1. Vapor Mitigation System/Sub-Slab Depressurization System Operation, Maintenance, and Monitoring (OMM) Plan	
2. Engineered Cover OMM Plan	
D. Statistical Analysis Documentation	
1. Statistical analysis results	
2. Plume stability/concentration trend plots	

Resources:

Risk-Based Closure Guide (R2)

R2 acronyms list

SCP Guide (WASTE-0076-NPD)

VRP Guide (WASTE-0077-NPD)