

BACWA

For 9/9/2019 Meeting



Regulation 11-18

RISK REDUCTION FOR EXISTING FACILITIES

- **Adopted November 15, 2017**
- **Requires facilities to:**
 - Reduce their health risks below stringent risk action levels or
 - Implement best available retrofit control technologies, or “TBARCT” on all significant risk sources

Regulation 11-18 Thresholds

PRIORITIZATION SCORES

	PHASE I	PHASE II
Cancer Risk PS *	≥ 250	≥ 10
Non-Cancer PS *	≥ 10	≥ 1.0

* PS is the unadjusted prioritization score using a proximity adjustment factor of 1.

- **POTW's are in Phase II.**
- **AD expects to begin reviewing Phase II sites in January 1, 2020.**

Regulation 11-18 Thresholds

Prioritization Score Equations

$$PS_{\text{CANCER}} = \sum \{(E_i) * (U_i)\} * (\text{PAF}) * (\text{NF}_{\text{CANCER}})$$

$$PS_{\text{NON-CANCER}} = \sum \{(E_i) / (\text{REL}_i) / (8760)\} * (\text{PAF}) * (\text{NF}_{\text{NON-CANCER}})$$

- E_i : Toxic air contaminant emissions from the facility (pounds/year) of each TAC (i)
- OEHHA approved toxicity factors for each toxic air contaminant:
 - U_i : Unit Risk Value for each carcinogenic TAC (i), $(\mu\text{g}/\text{m}^3)^{-1}$
 - REL_i : Chronic Reference Exposure Level (REL) for each TAC (i), $\mu\text{g}/\text{m}^3$
- PAF: Proximity Adjustment Factors (PAF) for nearest receptor
- NF: Normalization Factors (NF) for each type of health effect ($\text{NF}_{\text{CANCER}}$ and $\text{NF}_{\text{NON-CANCER}}$)

$$\text{NF}_{\text{CANCER}} = 7700$$

$$\text{NF}_{\text{NON-CANCER}} = 150$$

Regulation 11-18 Thresholds

RISK ACTION LEVELS

Effective Date:	Initial Jan. 1, 2018	Final Jan. 1, 2020
Cancer Risk	25 per million	10 per million
Non-Cancer:		
Chronic Hazard Index	2.5 2.5	1.0 1.0
Acute Hazard Index		

- **All facilities will be subject to the Final risk action levels.**

Data Review and Health Risk Assessment



Site
Prioritization
Score Exceeds
a Threshold

**Data Review -
7 months**



**Draft HRA -
7 months**



**Final HRA -
4 months**

AD
Publishes
Final HRA

Tasks	Months
AD Sends Data Request to Site	1
Site Adds & Corrects Data	2-4
AD Validates Data	1-2

Tasks	Months
AD Completes Preliminary HRA	2-3
Site Reviews Preliminary HRA	3
AD Responds to Comments & Prepares Draft HRA	1

Tasks	Months
AD Publishes Draft HRA	0.5
Public Comments on Draft HRA	1.5
AD Responds to Comments & Updates HRA	2

Approval of Risk Reduction Plans



Tasks	Months
Facility Submits Initial RRP	6
AD Reviews RRP for Completeness	1
Facility Submits Complete RRP	1-3

Tasks	Months
AD Evaluates Complete RRP	1.5
Facility Responds to Deficiencies	1.5
AD Evaluates Facility Responses	1

Tasks	Months
AD Publishes Draft RRP	0.5
Public Comments on Draft RRP	1.5
AD Considers Comments & Makes Final Decision on RRP	1-2

Regulation 11-18 Timelines

RULE 11-18 IMPLEMENTATION SCHEDULE

Implementation Steps:	2018				2019				2020				2021				2022				2023				2024				2025				2026 - 2029			
	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4				
Build Additional Infrastructure, Update Web Site																																				
Validate Data																																				
Conduct and Review HRAs																																				
Review and Approve Risk Reduction Plans																																				
Implement Risk Reduction Measures: Phase I																																				
Implement Risk Reduction Measures: Phase II																																				

DRAFT

- Key:
- Phase I Sites - Data Validation and HRA Preparation
 - Phase I Sites - Review and Approval of RRP
 - Phase II Sites - Data Validation and HRA Preparation
 - Phase II Sites - Review and Approval of RRP
 - Other Air District Activities