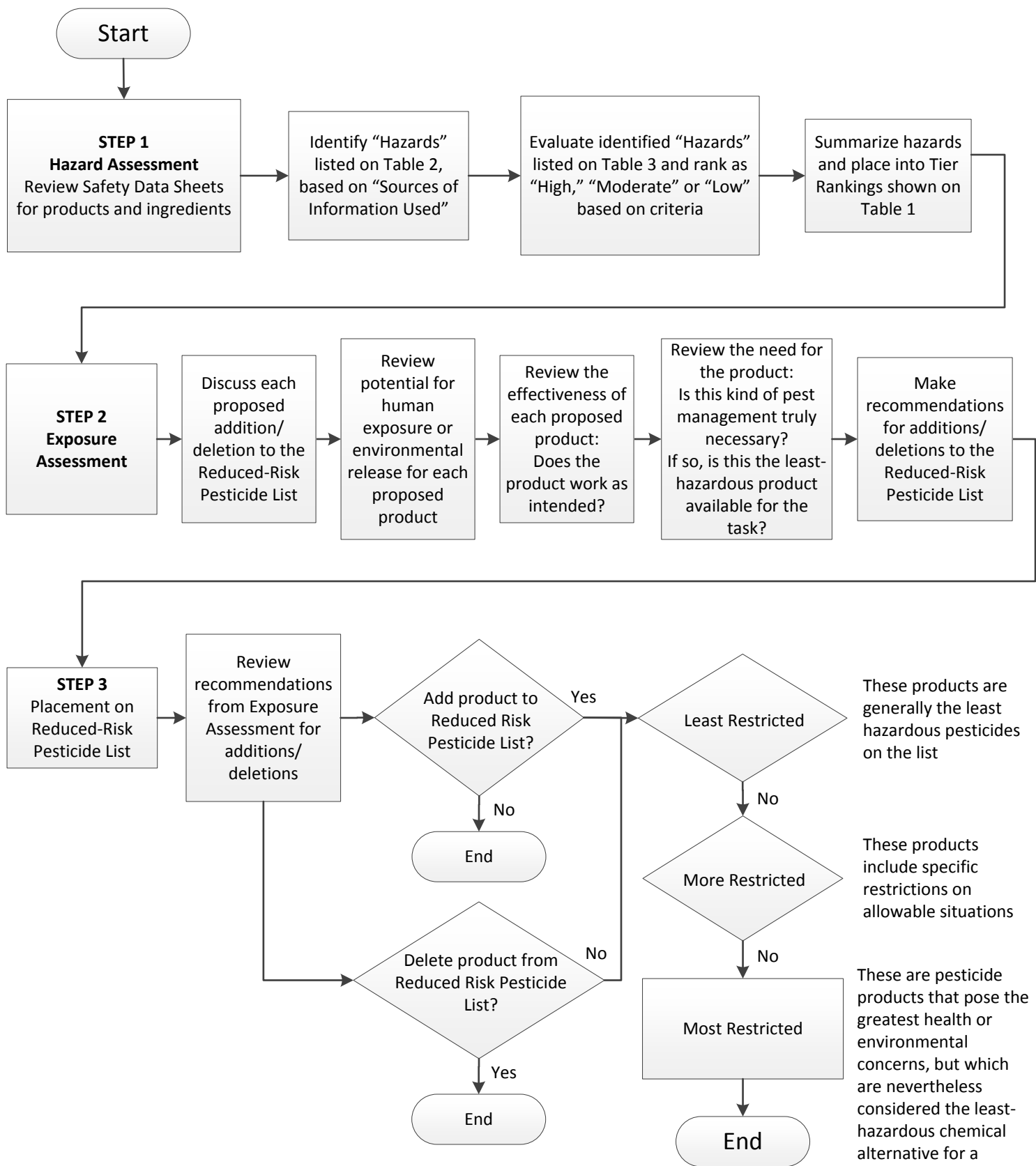


# UCR IPM Plan Reduced-Risk Pesticide List Hazard Screening Process<sup>1</sup>



<sup>1</sup>Based on San Francisco Department of Environment Reduced Risk Pesticide Screening System, Revised September, 2013  
<http://www.sfenvironment.org/download/guide-to-the-reduced-risk-pesticide-list-revised-2013>

**Table 1: Tier Rankings Derived from Hazard Screening**

Tier	Definition
Tier 1	Highest concern. At least one criterion in Table 3 placed in highest hazard category.
Tier 2	Moderate concern. At least one criterion in Table 3 placed in the moderate hazard category.
Tier 3	Lowest concern. No criteria flagged for Tier 1 or Tier 2.

**Table 2: Hazards Evaluated and Data Sources Used**

Hazard	Source(s) of Information Used
Acute toxicity	Product label: Signal word (Caution, Warning or Danger)
Restricted use	Product label: Use restricted to professional applicators
Cancer	Cancer classification of ingredient by US EPA, State of California (Proposition 65 list) <sup>20</sup> , National Toxicology Program (Report on Carcinogens) <sup>21</sup> , or the International Agency for Research on Cancer (IARC Monographs) <sup>22</sup>
Reproductive or Developmental Toxicity	Designation of ingredient by the State of California (Proposition 65 list <sup>20</sup> ), US EPA on the Toxics Release Inventory list <sup>1</sup>
Endocrine disruption	Designation of ingredient by the European Commission <sup>2</sup> or included in the book <i>Environmental Endocrine Disruptors</i> by Lawrence H. Keith <sup>3</sup>
Water pollution potential	Ingredient listed under Clean Water Act Section 303(d). <sup>4</sup>
Hazard to birds	Product label or MSDS: Presence and wording of bird hazard statement or LD <sub>50</sub> or LC <sub>50</sub> of product (if available).
Hazard to aquatic life	Product label or MSDS: Presence and wording of fish hazard statement or LC <sub>50</sub> of product (if available).
Hazard to bees	Product label or MSDS: Presence and wording of bee hazard statement or LD <sub>50</sub> or LC <sub>50</sub> of product (if available).
Hazard to wildlife	Product label or MSDS: Presence and wording of wildlife hazard statement or LD <sub>50</sub> or LC <sub>50</sub> of product (if available).
Soil mobility	Soil mobility score (Groundwater Ubiquity Score or GUS) calculated from physical properties or CA DPR's assessment of groundwater contamination potential using physical properties. Physical property data available in the OSU Pesticide Properties Database, <sup>5</sup> CA DPR Pesticide Contamination Prevention Act Status Reports, <sup>6</sup> or the EU Footprint Pesticide Properties database. <sup>7</sup>
Persistent, Bioaccumulative, Toxic substances (PBTs)	US EPA Waste Minimization priority chemical <sup>8</sup> or listed by the European Union as fulfilling PBT or Persistent Organic Pollutant (POP) criteria. <sup>9</sup>

**Table 3: Criteria for San Francisco Hazard Tier Ranking**

Hazard	High	Moderate	Low
Signal word	Danger	Warning	Caution or none
Restricted use	Yes	–	No
Cancer (see Table 1)	Known or Probable	Possible	Unclassifiable, Not Likely, Not Listed
Reproductive or Developmental Toxicity	Listed	–	Not listed
Endocrine disruption	EC category I or II	–	EC category III or not listed
Water pollution	303(d) listed	–	Not listed
Hazard to birds	"Extremely toxic" or "Highly toxic" according to product label, or high product toxicity based on LC <sub>50</sub> or LD <sub>50</sub> (see above)	"Toxic" according to product label, or moderate product toxicity based on LC <sub>50</sub> or LD <sub>50</sub> (see above)	No warning on product label, or low product toxicity based on LC <sub>50</sub> or LD <sub>50</sub> (see above)
Hazard to aquatic life	"Extremely toxic" or "Highly toxic" according to product label, or high product toxicity based on LC <sub>50</sub> (see above)	"Toxic" according to product label, or moderate product toxicity based on LC <sub>50</sub> (see above)	No warning on product label, or low product toxicity based on LC <sub>50</sub> (see above)
Hazard to bees	"Extremely toxic" or "Highly toxic" according to product label, or high product toxicity based on LD <sub>50</sub> (see above)	"Toxic" according to product label, or moderate product toxicity based on LD <sub>50</sub> (see above)	No warning on product label, or low product toxicity based on LD <sub>50</sub> (see above)
Hazard to wildlife	"Extremely toxic" or "Highly toxic" according to product label, or high product toxicity based on LC <sub>50</sub> or LD <sub>50</sub> (see above)	"Toxic" according to product label, or moderate product toxicity based on LC <sub>50</sub> or LD <sub>50</sub> (see above)	No warning on product label, or low product toxicity based on LC <sub>50</sub> or LD <sub>50</sub> (see above)
Soil mobility	–	GUS ≥2 or DPR classifies AI as exceeding SNVs	GUS <2 and Not listed by DPR as exceeding SNVs.
PBT	Listed	–	Not listed