

TABLE 5-4  
 Contribution of Toxic Air Contaminants to Cancer Risks and Chronic Hazard Index at the Maximum Exposed Receptors  
 Evergreen Pulp Human Health Risk Assessment

Health Risk	TAC	Contributions (%)	
		MEIR	MEIW
Cancer	* Chromium, Hexavalent (and compounds)	63.6	68.5
	* Acetaldehyde	24.5	20.6
	* Naphthalene	4.0	5.2
	* Perchloroethylene (Tetrachloroethene)	2.2	0.99
	* Benzene	2.1	1.2
Chronic Hazard Index	Acrolein	65.2	46.2
	* Acetaldehyde	25.5	34.1
	Ammonia	5.2	12.7
	* Formaldehyde	2.8	4.2
	* Nickel	0.6	1.1

TABLE 5-5  
 Contribution of Toxic Air Contaminants to Acute Hazard Index at the Maximum Exposed Receptors  
 Evergreen Pulp Human Health Risk Assessment

Health Risk	TAC	Contributions (%)
Acute Hazard Index (at PMI)	Acrolein	99.6
	Ammonia	0.19
	* Formaldehyde	0.17
	Phenol	0.007
	Methyl Ethyl Ketone (2-Butanone)	0.005

### 5.3 Conclusion

As shown in Table 5-1, the modeled cancer health risk at point of maximum impact (PMI) is above the threshold limits established by the California Air Toxics Hot Spots program. However, the PMI is near the facility property boundary, where there are no residences or workers that could be exposed. The nearest resident is 700 meters to the west of the PMI and the nearest worker is 750 meters to the north of the PMI. These locations represent the MEIR and the MEIW, respectively. At these locations, the cancer risk is well below the significance threshold, the hazard index for chronic exposures is below the significance threshold, and the health impacts for acute exposures is reduced by more than a factor of 2 compared to the PMI.

The cancer and chronic health risks associated with the Evergreen mill emissions are below the NCUAQMD significance thresholds for worst-case residential and worker exposure