



NC Department of Health and Human
Services

Update on EPA's Draft GenX Toxicity Assessment

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EPA Releases GenX Toxicity Assessment

- **Draft for public comment**
- **60-day public comment period ending January 22, 2019**
- **Includes two draft toxicity values for GenX chemicals**
 - **Subchronic RfD = 0.0002 mg/kg/day**
 - **Chronic RfD = 0.00008 mg/kg/day**
- **NC DHHS provisional RfD = 0.0001 mg/kg/day**

Similarities

- **Apply to oral route of exposure (ingestion)**
- **Derived for non-cancer endpoints**
- **Identified same toxicological studies**
- **Used the same critical study**
 - **Subchronic study in mice**
- **Used the same critical effect**
 - **Single cell necrosis in the liver**
- **Same intraspecies uncertainty factor of 10**

Differences

- **Point of departure**
 - **Benchmark Dose Modeling versus the No Observed Adverse Effect Level**
- **Interspecies differences**
 - **Allometric scaling**
- **Database completeness uncertainty factor**
 - **EPA = 3; NC DHHS = 1**
- **Subchronic to chronic uncertainty factor**
 - **EPA = 3; NC DHHS = 10**

NC DHHS Next Steps

- **Current EPA assessment is draft and subject to change following public comments**
- **NC DHHS will reassess the provisional health goal for GenX in drinking water upon EPA's final release**



Questions?