

Metropolitan WWTP NPDES Permit Reissuance

Presented to:

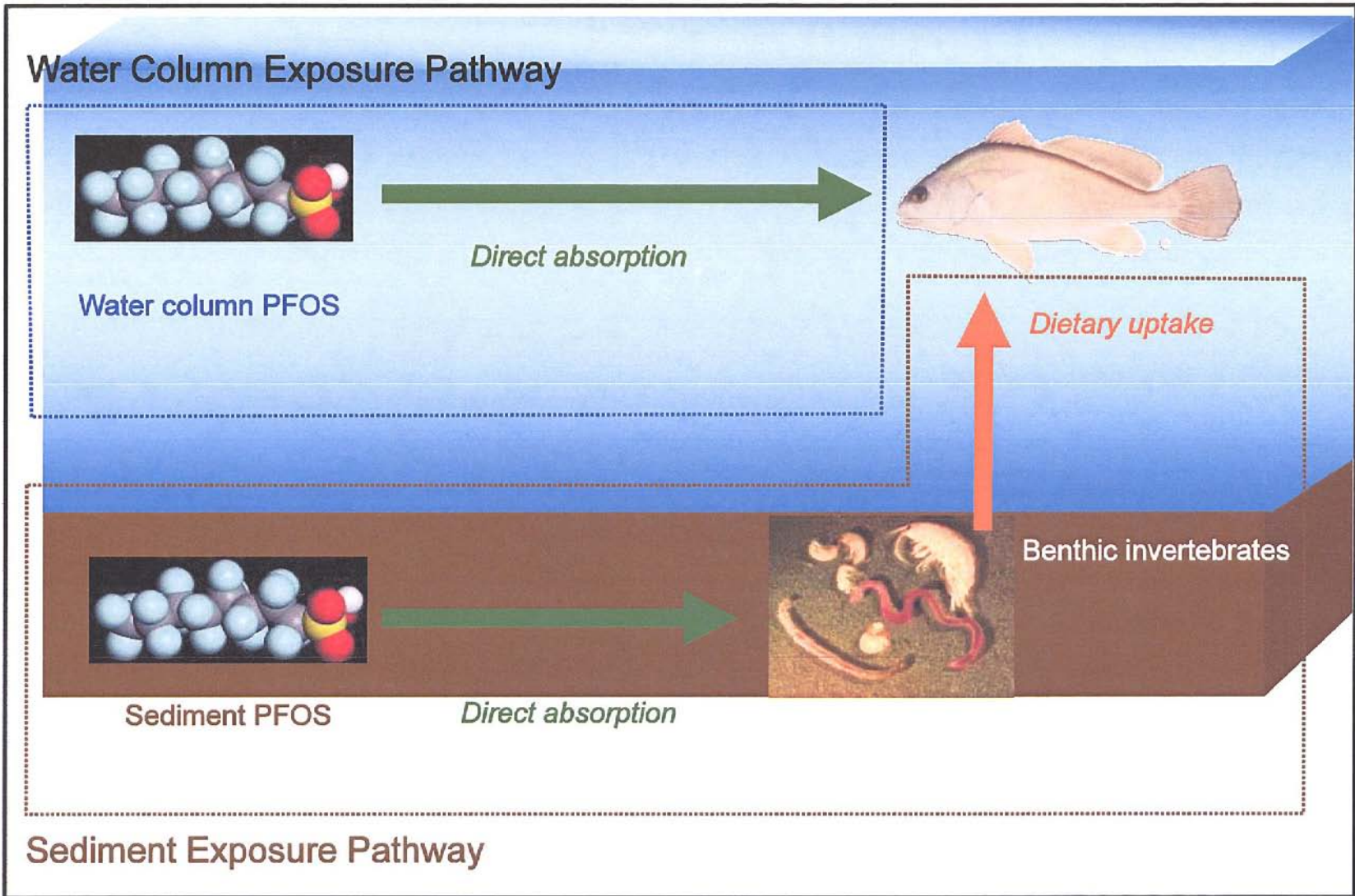
Environment Committee
September 27, 2011

Management Committee
September 28, 2011



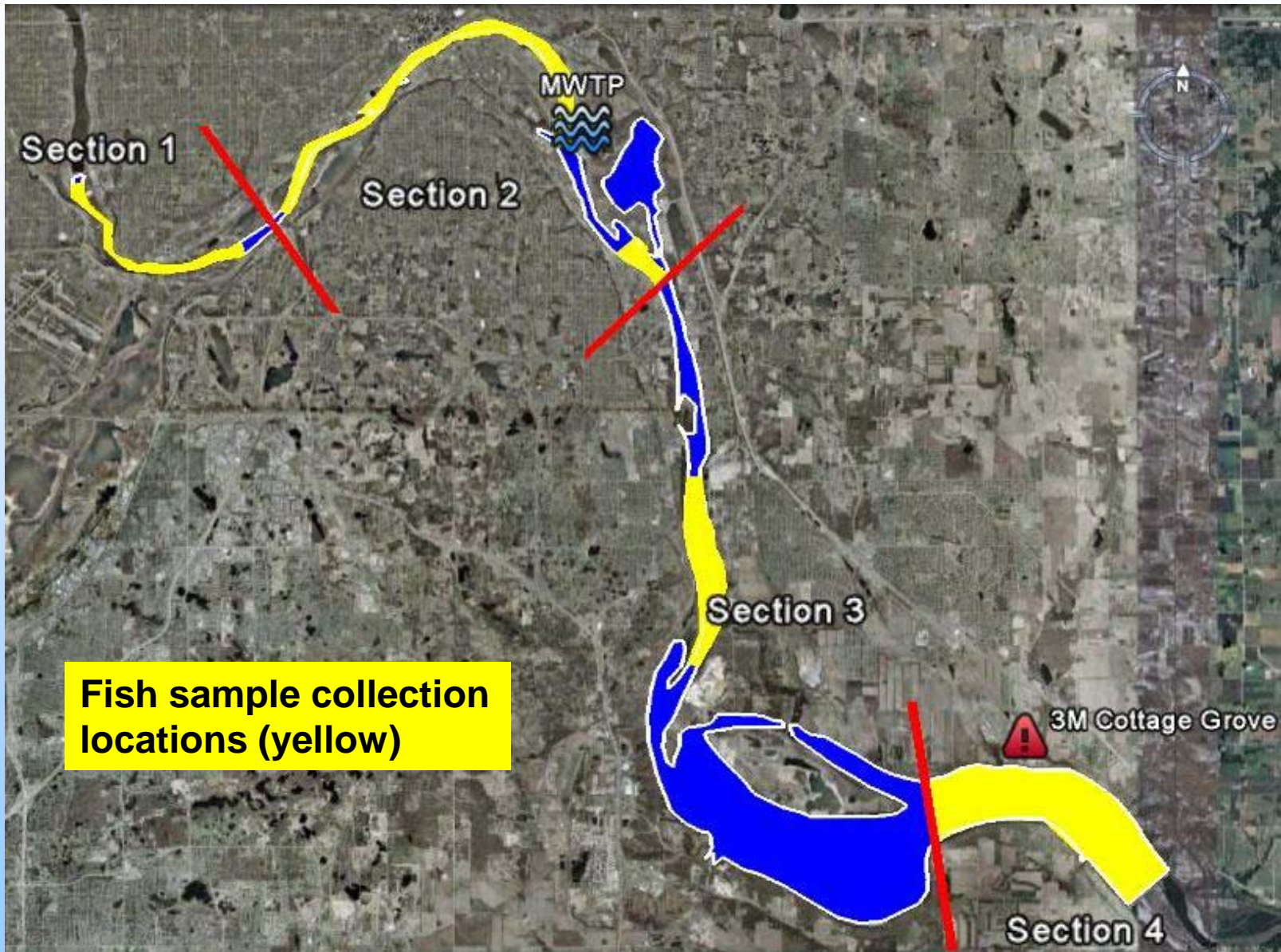
PFOS Background

- **PFCs (including PFOS) are a family of proprietary 3M chemicals used for decades to make products that resist heat, oil, stains, grease and water**
- **Common uses include nonstick cookware, stain-resistant carpets/fabrics, firefighting foam component, coatings for packaging (e.g. milk cartons), cosmetic additives, and other personal products**



FILE: \\irvine06.irvine.environ.local\EDMS_Irvine\01_Projects\MetropolitanCouncil\03_GIS\PFOS_Report\2024\193A_Figures.ppt

MRP₂ MPCA Fish Sampling Areas





PFOS Remediation

- **MPCA is requiring 3M to remove contaminated sediment**
- **PFOS has a short half life in fish tissues. Impact of sediment removal project will be known quickly**
- **Impact should be assessed before effluent limits are developed**
- **Additional remediation may be needed to correct problem**
- **No follow-up planned to determine success**



Regulatory Limit

- **Proposed NPDES Standard 10 ng/l monthly and 17 ng/l daily**
- **Current effluent discharge 60 ng/l**
- **MDH drinking water standard 300 ng/l**
- **Low potential for compliance**



Technology Constraints

- **Activated carbon (AC) technology for Metro is expensive and questionable**
- **Metro's volume, peak flows, and quality would be difficult to design and operate and it is unlikely to consistently achieve limit**
- **Potential costs will be over \$1 billion**
- **Our assessment is that this investment would not have any impact on fish advisory**



Conclusion

- **MCES at risk of receiving permit limit**
- **High cost for compliance / low reliability**
- **Low environmental benefit**