





Dr. Latif Kalin (Auburn University): Towards Development of a Hydrologic/Hydraulic Model for the Toulmin Springs Branch Watershed

- **There is no tidal impact in the majority of the watershed.** Only at the most downstream sampling location (#1) are tide effects observed, but not substantial.
- **Most big rains did not generated big flows in the channels where pressure transducers have been installed.** All major branches are monitored, but with several events greater than two inches and negligible flow discharge, **the model was calibrated for depth only.**
- **There is a lot of trash and debris that seems to underlie local problems.** They either clog drainage ways or cause water to back up at bridges. Thus, locally, water levels could be higher than anticipated, and a good maintenance program is what TSB needs.
- With only a single sampling, **extremely high *E. coli* counts** (practically unsafe for contact) **were found at ALL sites.**
- With regard to Phosphorus and Nitrogen, we found consistently high P concentrations in at least one site, but recent measurements were very low. **Suggests sporadic sources of nutrients in the watershed.**