Bridge to Doctorate Meeting Minutes
December 3, 2018

Facilitator: Steven J. Toro
Minute Taker: Victor Calle
Duration: 11:00 am – 12:15 pm.

Presentation
Acetaminophen-Induced Liver Injury

1. Liver Properties/Anatomy
   - Great Regenerative Capacity
   - Blood Filtration
   - Production
   - 2 lobes → 8 segments → thousands of lobules
   - Hepatic circulation

2. Drug Metabolism
   - Ingestion/Absorption/Distribution/Metabolism/Excretion
   - Binding of albumin to drug products
   - Phases of Aspirin metabolism

3. Acetaminophen
   - CYP metabolism → NAPQI (cytotoxic) → normally made nontoxic by GSH, yet GSH depletion leads to cytotoxicity
   - 50% of liver transplants are from overdose-related liver failure

4. Rodent Model of Autoprotection
   - Hypothesis: MSO increases the capacity for hepatocytes to deal with cytotoxic chemicals
   - LDH 5 = Biomarker of liver damage
     o LDH activity Assay
   - MSO treatment did not alter APAP-induced cytotoxicity in vitro (multiple cell lines)
Primed Yourself

- How you start your day before you get into lab
- Analysis of characteristics/struggles of extremely successful people
- Examination of morning rituals vs. routines
- Value of and forms of Introspection

Concluding remarks:

Upcoming Meeting: January 23rd, 2019
Facilitators: Aida & Randi

Attendees:
Kevin Rivera
Pierre Fils
Cristian Aviles Martin
Brandon Williams
Roman Mays
Godwin Dzidotor
Steven J. Toro
Aida Ghiaei
Randi Mendes
Jessica Maita
Victor Calle