Capstone Project Poster Titles
2014 -2015

Bench Research

1. Towards Identification of Critical Waters for Accurate Prediction of Inhibitor Binding to Cytochrome P450 3A4
   Brett Lacy, Pharm.D. Candidate
   Mentor: Maria Kontoyianni, Ph.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

2. The Effects of a High-fat Diet and Exercise on Muscle FNDC5 Levels in C57Bl/6 Mice
   Stephanie Vick, Pharm.D. Candidate
   Mentor: Brianne Guilford, Ph.D.
   Southern Illinois University Edwardsville, Edwardsville, Illinois

Business Plans

1. Union Drugstore: An Independent Pharmacy
   James Bivona, Pharm.D. Candidate
   Mentor: Todd Evers, R.Ph.
   Evers Pharmacies, Collinsville, Illinois

2. Business Plan for Grace Health Center and Pharmacy
   Lauren Breden, Pharm.D. Candidate
   Mentor: Bart Caldieraro, R.Ph.
   Watsons Drug Store, Greenville, Illinois

3. Tri-County Medical Supply Business Plan
   Lisa Eilerman, Pharm.D. Candidate
   Mentor: Leslie Baker, R.Ph.
   WalMart Pharmacy, Wood River, Illinois

4. Long Term Complete Care: Serving the Delmar Gardens of Chesterfield, West, and North Long Term Care Facilities
   Erick Gill, Pharm.D. Candidate
   Mentor: Steve Hebel, R.Ph.
   Corum Healthcare, St. Louis, Missouri

5. Personalized Medicine: Implementation in Pain Management
   James Langley and Bradlee Rea, Pharm.D. Candidates
   Mentor: Darren Hillis, Pharm.D.
   DePaul Hospital, St. Louis, Missouri
6. **Genetic Advantage**
Bryan Lumpkin, Pharm.D. Candidate  
Mentors: Walter Siganga, Ph.D.  
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois  
Best Presentation Award – SIUE School of Pharmacy Poster and Presentation Day 2015

7. **Business Plan for a Blood Pressure Initiative**
Jessica Trader, Pharm.D. Candidate  
Mentor: Teagan Ryan, R.Ph.  
Medicine Shoppe Pharmacy, Springfield, Illinois

8. **PharmZ, LLC**
Catherine Zollars, Pharm.D. Candidate  
Mentor: Micah Howell, Pharm.D.  
Howell Pharmacy, Edwardsville, Illinois  
Honorable Mention – SIUE School of Pharmacy Poster and Presentation Day 2015

### Surveys

1. **Naloxone Rescue Therapy for Individuals with Serious Mental Illnesses and Addiction: A Pilot Evaluation of Use and Understanding Among Healthcare Providers**
Nicholas Beiermann, Pharm.D. Candidate  
Mentor: Kelly Gable, Pharm.D.  
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

2. **Survey of Community Pharmacist Knowledge of Acetaminophen Containing Products**
Emil Borowiak, Pharm.D. Candidate  
Mentor: Miranda Wilhelm, Pharm.D.  
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

3. **Pilot study over four months to determine if knowledge and measurement of body composition leads to improved results, better diet and increased exercise**
Julia Bost, Pharm.D. Candidate  
Mentor: Kimberly Meador, R.Ph.  
Walgreens Pharmacy, Bethalto, Illinois

4. **Prescription Wait Times in a Community Pharmacy: A Survey of Patient Expectations**
Derek Burns, Pharm.D. Candidate  
Mentor: Bria Sims, Pharm.D.  
CVS Pharmacy, Mount Vernon, Illinois
5. Units of Measure used for Pediatric Liquid Prescription Dosing in the Community Pharmacy
   Ryan Crouse, Pharm.D. Candidate
   Mentor: Beth Francis, R.Ph.
   CVS Pharmacy, Mount Vernon, Illinois

6. Self-perceived impact of study abroad on pharmacy students’ cultural competence
   Emily Donahue McMahill, Pharm.D. Candidate
   Mentor: Kelly Gable, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

7. Southern Illinois Community Pharmacists’ Perceptions on Over-the-Counter Syringe Sales
   Justin Freeman, Pharm.D. Candidate
   Mentor: Christine Reyling, R.Ph.
   Walgreens Pharmacy, Collinsville, Illinois

8. Student Perceptions of a Performance-Based Assessment Final Exam in a Self-Care Elective Course
   Audra Hipsher Keepes, Pharm.D. Candidate
   Mentor: Miranda Wilhelm, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

9. Effects on Patient Adherence Due to Communication Delays between Doctors’ Offices and Pharmacies
   Curtis Hoalt, Pharm.D. Candidate
   Mentor: Brian Russell, Pharm.D.
   Walgreens Pharmacy, Maryville, Illinois

10. Evaluation of Southern Illinois University Edwardsville Education Major’s Confidence and Knowledge in Educating Students about Prescription Drug Abuse
    Nathan Lindley, Pharm.D. Candidate
    Mentor: Jessica Kerr, Pharm.D.
    Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

11. Media and Legislative Impact on Provider Attitudes Toward a Recently Approved Opioid Analgesic
    Sara Lindsay, Pharm.D. Candidate
    Mentor: Christopher Herndon, Pharm.D.
    Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

12. Evaluation of a Needle-Free Injection System Training Program
    Keith Marry, Pharm.D. Candidate
    Mentor: Miranda Wilhelm, Pharm.D.
    Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois
13. An Electronic Pharmacist Intervention Documentation Program (DOC-U-Vent) in Ambulatory Healthcare Settings: A Pilot Study
Dana McGinnie, Pharm.D. Candidate
Mentor: Lakesha Butler, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

14. Influenza Vaccination: A Survey to Pharmacy Students at Southern Illinois University Edwardsville
Michael Menzel, Pharm.D. Candidate
Mentor: Alexander Bryant, Pharm.D.
Mercy Hospital, St. Louis, Missouri
Honorable Mention – SIUE School of Pharmacy Poster and Presentation Day 2015

15. Prescriber Perceptions of Communications between Community Pharmacists and Physicians
Nicole Mindrup, Pharm.D. Candidate
Mentor: Brian Russell, Pharm.D.
Walgreens Pharmacy, Maryville, Illinois

16. An Analysis of the Returned To Stock Medications at a Retail Pharmacy
Ibrahim Mohsen, Pharm.D. Candidate
Mentor: Mike Lawler, Pharm.D.
WalMart Pharmacy, St. Louis, Missouri

17. Assessing Pharmacists’ Knowledge of Current Substance Abuse, Treatment and Recovery Programs
Kelsey Mosher, Pharm.D. Candidate
Mentor: Kate Newman, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

18. Pharmacists’ Awareness and Perception of Pharmacogenomics
Eric Niebrugge, Pharm.D. Candidate
Mentor: Ronald Worthington, Ph.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

19. Assessing and Describing Recovery Resources Available for Pharmacists
Lindsey Reno, Pharm.D. Candidate
Mentor: Misty Gonzalez, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

20. The Design, Implementation, and Evaluation of a Pediatric Specialization at a School of Pharmacy
HollyAnn Russell, Pharm.D. Candidate
Mentors: Lisa Lubsch, Pharm.D. and Miranda Nelson, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois
   Kevin Sager, Pharm.D. Candidate
   Mentor: Eric Bandy, R.Ph.
   Bandy’s Health Mart Pharmacy, Salem, Illinois

22. Staffing Requirements of PGY1 Pharmacy Residencies in Large Hospitals and PGY2 Pediatric Residencies
   Cody Schaefer, Pharm.D. Candidate
   Mentors: Jennifer Ellison, Pharm.D. and Julie Kasap, Pharm.D.
   OSF St. Francis Medical Center, Peoria, Illinois

23. Comparison of the Personal Pharmacist Service in Croatia to Medication Therapy Management in the United States
   Amanda Schneider, Pharm.D. Candidate
   Mentor: Kelly Gable, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

24. Rural Community Pharmacy and Mental Health Treatments: A Needs Assessment and Training Opportunity
   Jerica Sneed, Pharm.D. Candidate
   Mentor: Kelly Gable, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

25. The Development of an Educational Program for Pharmacists Addressing Deaf Culture Training and Communication with Deaf Patients
   Michelle Thies Lyons, Pharm.D. Candidate
   Mentor: McKenzie Ferguson, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

26. A Pilot Program to Assess Medication Adherence Among HIV Positive Patients
   Deni Trone, Pharm.D. Candidate
   Mentor: J. Christopher Lynch, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

27. Determining the Need For An Educational Course On Pet Medications Based On Pharmacist Knowledge And Pharmacy Sales
   Ashley Williams, Pharm.D. Candidate
   Mentor: Eric Hess, R.Ph.
   WalMart Pharmacy, Glen Carbon, Illinois

28. Assessment of Need to Prepare Primary and Secondary School Educators to Discuss Prescription Drug Abuse with Youth
   Dana Wright, Pharm.D. Candidate
Mentor: Jessica Kerr, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

29. *Allergic Bronchopulmonary Aspergillosis in Cystic Fibrosis*
Breanna Wyman, Pharm.D. Candidate
Mentor: Lisa Lubsch, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

Retrospective Chart Reviews, Drug Utilization Review, Review of Guidelines, etc.

1. *Relationship Between the Number of Medications and the Fall Risk in a Geriatric Nursing Home Setting*
James Blazier, Pharm.D. Candidate
Mentor: Stephen McConnell, R.Ph.
Everspring Pharmacy, St. Louis, Missouri

2. *Targeted Evidenced-based Education to Reduce Inappropriate Medication Use in End of Life Care*
Sarah Cooper, Pharm.D. Candidate
Mentor: Christopher Herndon, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

3. *Analysis of Patient Refill History to Assess Medication Adherence in Patients Taking Pancreatic Enzymes*
Marianne E. Dust, Pharm.D. Candidate
Mentor: Katie N. Mothershed, Pharm.D.
Foundation Care Pharmacy

Brianna Finch and Megan Herman Spraul, Pharm.D. Candidates
Mentor: Jennifer Rosselli, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

5. *Cost Analysis of Metered Dose Inhaler vs. Nebulizer Treatment in a Hospital Setting*
Benjamin Frietsch, Pharm.D. Candidate
Mentor: Ed Rainville, M.S., R.Ph.
OSF St. Francis Medical Center, Peoria, Illinois

6. *A Retrospective Study of Nitroglycerin Prescribing to Acute Coronary Syndrome Patients upon Hospital Discharge*
Jeremy Gray, Pharm.D. Candidate
Mentor: Cassandra Maynard, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois
7. **Pain Medication Utilization in Patients with Mental and Behavioral Illnesses in a State Hospital**
   Adam Gummersheimer, Pharm.D. Candidate
   Mentors: Robert Schmitt, R.Ph, MHA and Jose Valdes, Pharm.D.
   St. Louis Psychiatric Rehabilitation Center, St. Louis, Missouri and Nova Southeastern University College of Pharmacy, Ft. Lauderdale, Florida

8. **Pharmacist Impact on Pain Control and Opioid Utilization in Patients Enrolled in a Family Medicine Pain Service: A Retrospective Chart Review**
   Jaymi Holloman, Pharm.D. Candidate
   Mentor: Christopher Herndon, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

9. **Assessment of Ordering and Initiation of Insulin Infusion Order Set in a Medical Intensive Care Unit (MICU)**
   Khushbu Italia, Pharm.D. Candidate
   Mentor: Katie Ronald, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

10. **Retrospective Evaluation of Dosing Body Weight for Unfractionated Heparin in the Obese Population**
    Billee John and Emily Tesdal, Pharm.D. Candidates
    Mentor: Jingyang Fan, Pharm.D.
    Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

11. **Concurrent Use of Acetylcholinesterase Inhibitors and Anticholinergic Medications in Nursing Home Residents**
    Jessica Kerwin, Pharm.D. Candidate
    Mentor: J. Mark Ruscin, Pharm.D.
    Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

12. **A Retrospective Review of Emergency Department Antibiotic Prescribing Practices for Skin and Soft Tissue Infections at a Large, Midwestern, Tertiary Care, Teaching Facility**
    Claire Koch, Pharm.D. Candidate
    Julie Giddens, Pharm.D
    OSF St. Francis Medical Center, Peoria, Illinois
    Honorable Mention – SIUE School of Pharmacy Poster and Presentation Day 2015

13. **Retrospective Chart Review of Chronic Pain Management**
    Lauren Kormelink, Pharm.D. Candidate
    Mentor: Carrie Vogler, Pharm.D
    Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois
14. **Antibiotic De-Escalation in Patients Presenting with Healthcare-Associated Pneumonia in a Medical Intensive Care Unit versus the General Floor**
Claire Laughlin and Zak Vinson, Pharm.D. Candidates
Katie Ronald, Pharm.D., Julie Downen, Pharm.D., Maithili Deshpande, Ph.D., and Megan Metzke, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois and Memorial Medical Center, Springfield, Illinois
SIUE Senior Showcase Presenter 2015

15. **The Forgotten Transition of Care: Discharge Protocol from Hospital to Community Pharmacy**
Megan LeBaron, Pharm.D. Candidate
Mentor: Kristi Stice, Pharm.D
Kishwaukee Hospital, DeKalb, Illinois

16. **Standardizing Care for Patients with Diabetes during the Jamaica Dental Mission: A Retrospective Chart Review**
Cathryn McIntosh, Pharm.D. Candidate
Mentor: J. Christopher Lynch, Pharm.D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

17. **Comparison of Pharmacy Elective Offerings at Accredited U.S. Colleges and Schools of Pharmacy**
Kamrey McNutt, Pharm. D. Candidate
Mentor: Erin M. Behnen, Pharm. D.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

18. **Comparison of Calculated Patient Adherence Rates for Pancreatic Enzymes**
May Nguyen, Pharm.D. Candidate
Mentor: Katie Mothershed, Pharm.D.
Foundation Care Pharmacy, St. Louis, Missouri

19. **Discontinuation of Proton Pump Inhibitors Used for Stress Ulcer Prophylaxis at Hospital Discharge**
Edmond Paspali, Pharm.D. Candidate
Mentor: Amy Boblitt, Pharm.D.
Memorial Medical Center, Springfield, Illinois

20. **Analyzing the Use of Anticholinesterase Agents in Nursing Home Patients with Chronic Obstructive Pulmonary Disease and Bradycardia**
Lyle Pratt, Pharm.D. Candidate
Mentors: J. Mark Ruscin, Pharm.D. and Randy Malan, R.Ph.
Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois and Illinois Department of Human Services, Springfield, Illinois
SIUE Senior Showcase Presenter 2015
21. Impact of an Antimicrobial Stewardship Program on Meropenem Utilization and Patient Outcomes
   Kelly Quon, Pharm.D. Candidate
   Mentor: Julie Giddens, Pharm.D.
   OSF Saint Francis Medical Center, Peoria, Illinois

22. Vancomycin Use and Monitoring Following Rapid Testing of Bloodstream Cultures for Staphylococcus and Oxacillin Susceptibility
   Michael Santini, Pharm.D. Candidate
   Mentor: Scott Bergman, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

23. Evaluation of the Causation and Treatment of Pediatric Patients with DRESS Syndrome
   Sarah B Schuchard, Pharm.D. Candidate
   Mentor: Miranda P Nelson, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

   Cortney Spradling, Pharm.D. Candidate
   Mentor: Stacy Smith, R.Ph.
   Greenville Regional Hospital, Greenville, Illinois

25. Retrospective Chart Review Evaluating the Use of Azithromycin for Chronic Pulmonary Management of Children with Cystic Fibrosis
   Shana Stein Archer, Pharm.D. Candidate
   Mentors: Lisa Lubsch, Pharm.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois
   Best Poster Award – SIUE School of Pharmacy Poster and Presentation Day 2015

26. Analysis of Genetic Biomarkers of Fibromyalgia in One Pair of First Degree Relatives
   Christina Tiek, Pharm.D. Candidate
   Mentor: Ron Worthington, Ph.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

27. Comparison of Patient Controlled Analgesia and Continuous Infusion Dosing Regimens for Opioids in Pediatric Patients with Sickle Cell Vaso-Occlusive Pain Crisis
   Tabetha Todd, Pharm.D. Candidate
   Mentors: Jonica Huntman, Pharm.D. and Monica Hulbert, M.D.
   St. Louis Children’s Hospital and Washington University, School of Medicine, St. Louis, Missouri
   SIUE Senior Showcase Presenter 2015
28. Medicare Utilization and Payments in 2012 for Nuclear Medicine Practitioners
   Ting Zhang, Pharm.D. Candidate
   Mentor: Walter Siganga, Ph.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

Other

1. Pancreatic Cancer: A Case Study to Serve as a Guide for Pharmacists Interested in Pharmacogenetics
   Kevin Lyons, Pharm.D. Candidate
   Mentor: Ronald Worthington, Ph.D.
   Southern Illinois University Edwardsville, School of Pharmacy, Edwardsville, Illinois

2. Case Report: Gemcitabine-induced Pseudosepsis
   Alex Seay, Pharm.D. Candidate
   Mentor: Kathy Wheeler, Pharm.D.
   SSM Cancer Care Center, St. Charles, Missouri