ExamSoft Pilot: Assessing Metrics Based on Category Tagging to Evaluate Student Performance
Courtney Hochman, PharmD1; Sanjeewa A. Goonasekera, PhD2; Shauna Buring, PharmD2; and Patricia Wigle PharmD, BCPS, BCACP1
1James L. Winkle College of Pharmacy, Cincinnati, OH; 2University of Florida College of Pharmacy, Gainesville, FL

INTRODUCTION
- The use of ExamSoft as an assessment platform can facilitate the process of correcting and analyzing examinations and scores.1
- The purpose of this study was to use the category tagging system in ExamSoft for evaluation of exam content and student performance for two second-year pharmacy student courses, Therapeutics I and Therapeutics of Non-Prescription Drugs.

METHODS
- In the Fall semester 2015, ExamSoft (ExamSoft Worldwide, Inc., Dallas, TX) was utilized by first (P1) and second (P2) professional year students in the Doctor of Pharmacy (PharmD) curriculum on a pilot basis.
- It was piloted in 6 courses in the first and second professional year of the Doctor of Pharmacy program.
- The tagging system was assessed in the 2 courses with the highest likelihood for application and variability in Bloom’s taxonomy and question type.
- Six exams in Therapeutics I and four exams in Therapeutics of Non-Prescription Drugs were evaluated individually and in aggregate.
- Assessment questions were tagged to include Bloom’s Taxonomy, question writer, and question content. Questions were tagged by one investigator and then, verified separately by another investigator.
- Longitudinal evaluation of the all assessments in each course was obtained.
- Student responses for tagged questions were reported in aggregate and were interpreted using descriptive statistics.
- This research project was approved by the IRB at the University of Cincinnati.

RESULTS
- In Therapeutics I, the class scored lowest in contraindication/black box warning, dose adjustments, drug-drug interactions and highest in precautions, dermatology, and respiratory.
- In Therapeutics I, students receiving an A were most proficient in precautions, respiratory, and dermatology topics. Students receiving a C were most proficient in dermatology, respiratory, and non-pharmacologic topics.
- In the Therapeutics of Non-Prescription Drugs, students scored lowest in contraindications, dose adjustments and pediatric recommendations.
- In Therapeutics of Non-Prescriptions Drugs, students receiving an A were most proficient in medical devices, exclusion criteria, and CAM. Students receiving a C were most proficient in dermatology, exclusion criteria, and medical devices.

CONCLUSION
- Categorization of questions allowed for easy quantification of both question type and Bloom’s Taxonomy on exams in different courses.
- Student performance in certain categories is informative for faculty when emphasizing different course content.
- The tagging feature allows for reports to be run easier than doing this same process manually.
- These reports could help students identify which content areas and at what Bloom’s level they have the most challenges.
- In addition to use this data for individual student assessment, it can be used for overall curricular quality improvement as well.

REFERENCES