COP 4520 Spring 2020

Publication Guidelines

All teams are required to publish the reports from their Final Research Survey.
Here are instructions on how to publish your reports.

1. Choose a platform you will use to make your research publicly available and register.

I recommend you use:
ScienceOpen: https://www.scienceopen.com/ OR
ResearchGate: https://www.researchgate.net/

If you are adventurous, you can try:
EasyChair Preprints: https://easychair.org/publications/preprints
PeerJ: https://peerj.com/preprints/
Figshare: https://figshare.com/
Preprints: https://www.preprints.org/

2. List only your team as authors of the paper (do not include me as an author) and list your professional contact information (your UCF affiliation and e-mails).

2. Make sure you have not plagiarized any contents of your report or it will be found and reported by your publisher.

3. Include citations in your reports in order to give proper credit to the authors of the work you are exploring and discussing in your project report.

Make sure that you refer to the core paper(s) of your project, and also the papers describing MRLOCK and the fundamental lock-free programming techniques used in your project (such as Descriptor objects, ABA prevention, wait-free progress assurance schemes, etc.).

For convenience, here are some of these papers:

a) MRLOCK: Deli Zhang, Brendan Lynch, Damian Dechev, Fast and Scalable Queue-Based Resource Allocation Lock on Shared-Memory Multiprocessors, In Proceedings of 17th International Conference on Principles of Distributed Systems (OPODIS 2013), Nice, France, December 2013.

b) Use of descriptor objects: Deli Zhang, Pierre LaBorde, Lance Lebanoff, Damian Dechev, Lock-free Transactional Transformation, ACM Transactions on Parallel Computing (ACM TOPC), Vol. 5, No. 1, Article 6, June 2018.

c) ABA Problem: Damian Dechev, The ABA Problem in Multicore Data Structures with Collaborating Operations, In Proceedings of the 7th International Conference on Collaborative Computing: Networking, Applications and Worksharing (CollaborateCom 2011), Orlando, FL, October 2011.

d) Wait-free data structures: Steven Feldman, Pierre LaBorde, Damian Dechev, Tervel: A Unification of Descriptor-based Techniques for Non-blocking Programming, In Proceedings of

the 15th IEEE International Conference on Embedded Computer Systems: Architectures, Modeling, and Simulation (SAMOS XV), Samos, Greece, July 2015.

e) Performance testing of lock-free data structures: Ramin Izadpanah, Steven Feldman, Damian Dechev, A Methodology For Performance Analysis of Non-Blocking Algorithms Using Hardware and Software Metrics, In Proceedings of the 19th IEEE International Symposium on Object/component/service-oriented Real-time Distributed Computing (IEEE ISORC 2016), York, UK, May 2016.

f) Correctness testing of concurrent data structures: Christina Peterson, Pierre LaBorde, Damian Dechev, CCSpec: A Correctness Condition Specification Tool, In the 27th IEEE/ACM International Conference on Program Comprehension (ICPC '19), Montreal, QC, Canada, May 2019.

g) Progress verification of concurrent data structures: Christina Peterson, Victor Cook, Damian Dechev, Practical Progress Verification of Descriptor-Based Non-Blocking Data Structures, In Proceedings of the 27th IEEE International Symposium on the Modeling, Analysis, and Simulation of Computer and Telecommunication Systems (MASCOTS 2019), Rennes, France, October 22-25, 2019.

Additionally, scan the list of publications of AREA 67 lab (http://area67.cs.ucf.edu/publications/) and cite those who are relevant to your project. E.g. if your data structure is wait-free you can cite the wait-free data structure publications, if you data structures suffers from ABA you can cite a paper on the ABA problem, if your data structure uses descriptors you can cite the lock-free vector paper, if you use transactions you can cite the paper on lock-free transactional transformation, etc.

4. Title: Make sure that the title of your report is NOT the same as the title of the paper assigned to your team. At least add: "Re-implementation of", "Performance Analysis of", "Survey of" "Exploration of," etc.

Also, you are publishing a research report, so make your paper look like a report (not like a homework assignment), so give it a proper title and do not write: "Programming Assignment", "Project Report", etc. on your title page.

5. Submit your final pdf file to your publishing platform (ScienceOpen, ResearchGate, or some of the other platforms from the list). It is typically preferred if you register using a university e-mail address.

6. For every publishing assignment on Webcourses, please submit via Webcourses: a) the final pdf file submitted to the publishing platforms and b) confirmation of your submission.