Assignment #3 - B+Tree

SWE3003 Database Systems - Fall 2020

Due date: Dec 11 (Fri) 11:59pm

1 Objective

In this assignment, you will implement a B+ tree as described in the textbook.

2 Getting Started

Please copy all the files from ~swe3003/btree/ into your working directory. You may add any additional members in the provided classes, but you are not allowed to make any change to the public members since they are used by the driver program.

To make your life easier, you do not need to implement the remove and merge functions in this project. All the testcases will not have deletions.

To verify if your implementations are correct, you may find the following online B+-tree simulator useful.

https://goneill.co.nz/btree-demo.php

Even the pseudo code in our textbook is not 100% clear about certain corner cases. Hence, if you find the pseudo code is not clear, please check the online B+-tree simulator and follow its logic.

3 How to Submit

Submit your files using dbsubmit command in 'swji' node as follows. You need to submit all the files that you modified, i.e., .cpp and .h files. Therefore, the 2nd argument of dbsubmit command is the current working directory where you have all your source codes, i.e., '.'.

\$ dbsubmit btree .

Note that you can submit multiple times. But only the last submission will be graded. Using the following command, you can check whether your file has been correctly submitted.

\$ db_check_submission btree