

Title of the course: Parallel algorithms

Lecturer: Dr.Y. Kord Tamandani

yahya.kord@gmail.com

yahya.kord@cs.usb.ac.ir

Assessments:

Mid-term Exam	4 points
Final Exam	12 points
Class Activity	2 points
Attendance	2 points

Subjects to be discussed:

TOPICS	SESSIONS
INTRODUCTION TO PARALLEL ALGORITHMS AND THE NEED FOR PARALLEL PROCESSING	1st and 2nd sessions
MODELS OF COMPUTATION: SISD SIMD MIMD MISD	3rd and 4th sessions
SOME BASIC PARALLEL ALGORITHMS AND THEIR ANALYSIS	5th and 6th Sessions
CRCW EREW	7th and 8th session

**CREW
ERCW**

**PRIORITY CRCW
COLLISION CRCW
ARBITRARY CRCW
COMMON CRCW
TOLERANT CRCW**

**9th and 10th
sessions**

**TECHNIQUES TO WRITE PARALLEL
ALGORITHMS**

**11th and 12th
sessions**

ANALYSIS OF PARALLE ALGORITHMS

**13th ,14th and 15th
sessions**

**ADVANCED TOPIC IN PARALLEL
ALGORITHMS**

**16th and 17th
sessions**