



# SoC Design in Big Data Era

## 大数据时代的系统芯片设计

Chun-Zhang Chen, Ph.D.

June 25-29, 2018



中国科学院大学**2018**年夏季

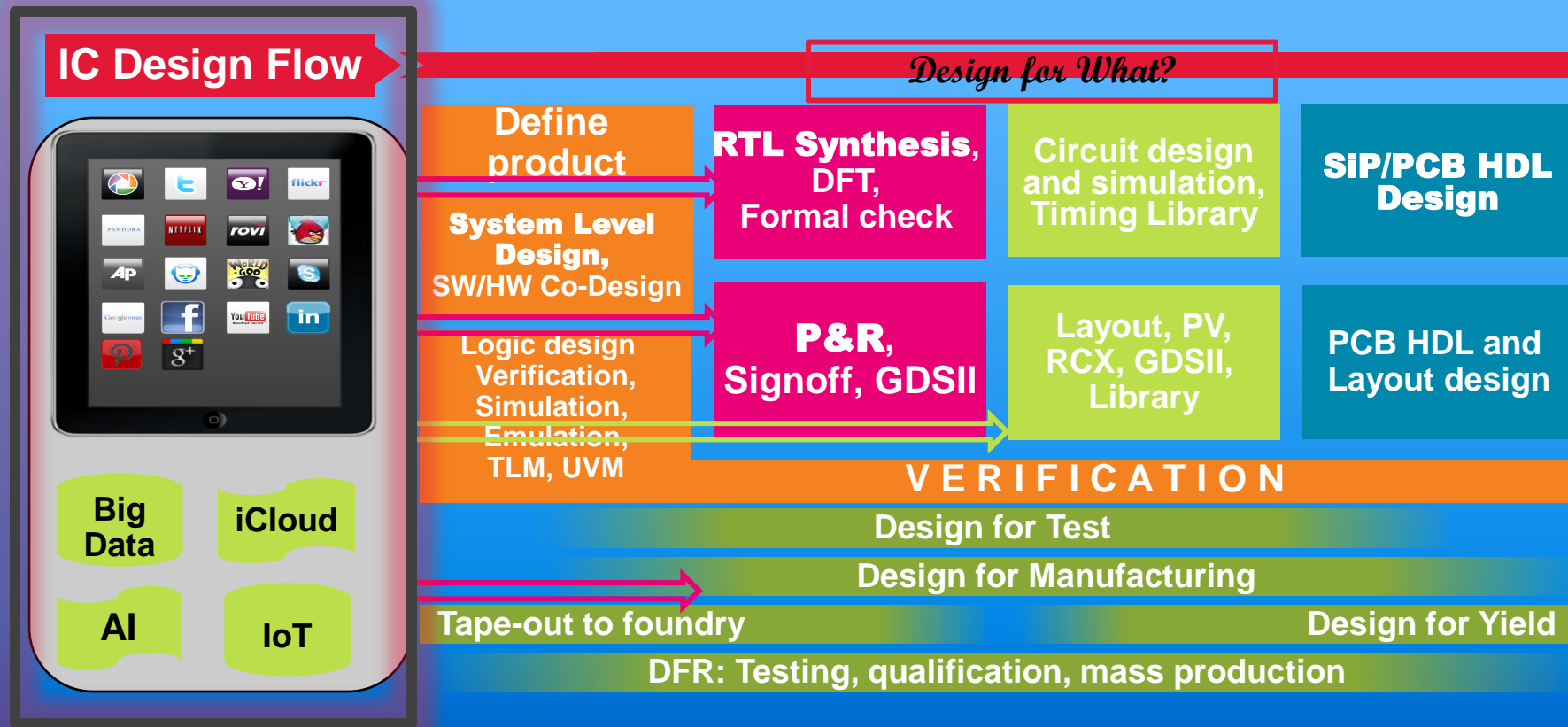
# SoC Design in Big Data Era

## Course Contents 2018

- Impact of AI-Big Data on SoC Design
  - [AI Study and AI-Chip Design](#), [Analysis & Storage](#), [App & Security of BD](#),
  - [IoT Technology and SoC Design](#), [ADAS and SoC Design](#)
- IDM/EDA/IP and System Design
  - [IDM/Product Chain of Semiconductor](#), [EDA Methodology & Design Flow](#),
  - [Memory Design and HBM](#), [xPU and DSA](#)
- Verification & Implementation of SoC Design
  - [System-Level Design/Verification](#), [Syn](#), [SDC and STA](#), [DFT and LEC](#),
  - [Physical Imp of SoC](#), [IP-SoC Integration](#)
- Design Variations and Design For Yield
  - [SPICE Lib](#), [RC and Delay](#),
  - [SI STA SSTA etc](#), [Low Power PI PA](#)
- Design for Reliability and Advanced Tech
  - [AMS UVM](#), [DFM and DFY](#), [ESD wrt DFR](#),
  - [RadHard wrt DFR](#), [Adv Tech in SoC and Summary](#)



# SoC Design in Big Data Era



# Home work and reading

## SoC Design in Big Data Era

### ● Text Books

#### ● Physical Design (Recommended)

#### ● MS Methodology (Optional)

### ● Homework

#### ● See separate file “Project\_18.doc”

### ● Down/Up load files from/to the class email:

#### ● [un2014en@163.com](mailto:un2014en@163.com) (SoC\_in\_BDE)

### ● Send your Report or Homework to

#### ● [czchen126@126.com](mailto:czchen126@126.com)

