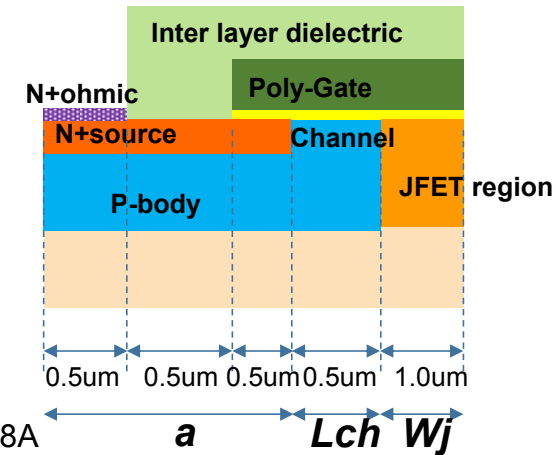


Project Title: Lower Cost 1.2kV Foundry Process for SiC Planar Gate Power MOSFETs and JBS Rectifiers

Objectives: Reduce manufacturing cost for SiC MOSFETs and JBS Rectifiers

Major Milestones: Fabrication of 3 Process Qual Lots

Deliverables: Statistical Data and Wafer Maps



SOPO Task No.: BP3-2.8A
 TPOC: Dr. Jay Baliga
 Email: bjbaliga@ncsu.edu
 Phone: 919-515-6169

WBG Technology Impact

1. Open domain manufacturing process for 1.2kV SiC MOSFETs and JBS rectifiers
2. Market segments impacted: EV/HEV inverter, PV Inverter, SMPS, etc
3. Timeframe for commercialization: BP-3
4. The outcome of this project will serve as the baseline process for PA members to design their own products and manufacture them at X-Fab.

More WBG Impact and Additional impacts

1. Increase market penetration for SiC power MOSFETs.
2. Workforce Development : 1 graduate student and two undergraduate students are involved.
3. TRL level
 At project start: TRL7
 Expected at project completion: TRL8