Summary: Session 5 - PMI Lab Experiments

M. Baldwin - PISCES: Be/W reactivity studied. Formation of a Be-rich W alloy, which was observed to melt near 1500 °C, could exacerbate surface melting of ITER PFCs. Further studies in progress.

J. P. Allain - IMPACT: Li/C interactions examined. Li deposited on C inhibits CH_4 formation and Li intercalates into C, which could affect recycling in NSTX. H interaction with Li on metals and properties of LiOH surfaces being examined.

R. Anderl - TPE: Re-commissioning underway at INL with operations expected to begin this September. Studies of T retention in Be, W, and Be/W to follow.

R. Bastasz - DiMES: A compact, solid-state CX flux diagnostic tested in DIII-D. Device being considered for future use in advanced PMI diagnostics.

M. Coventry - IIAX: Modifications complete for high-temp studies up to 1000 °C. Self-sputtering measurements of liquid Sn to be made. Equipment can also measure high-temp sputtering of solid Be and W.

T. Gray - ESP gun: PFN has been tested and plasma formation observed. Further development needed to simulate ELM effects on PFC materials.

D. Ruzic - FLIRE: Ion beam shutter installed. New results show no He pumping by liquid Li yet. Additional data being recorded.