

UNIVERSITY OF MASSACHUSETTS BOSTON
CENTER FOR PERSONALIZED CANCER THERAPY
PRESENTS THE FALL 2015 SEMINAR SERIES:

MONDAY, DECEMBER 7, 2015

AT 2:00PM

INTEGRATED SCIENCES COMPLEX ISC-

PAUL MARKER, PH.D.

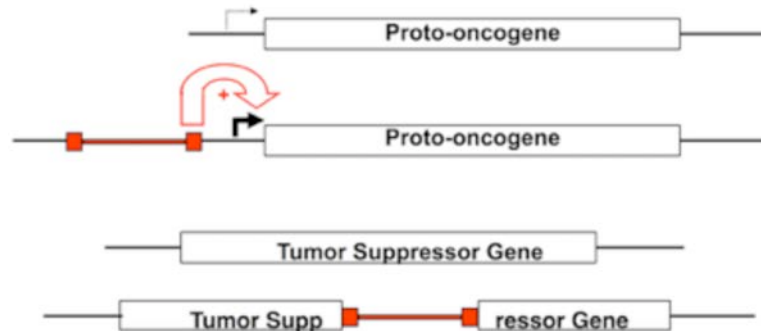
PROFESSOR AND ASSOCIATE DEAN FOR RESEARCH

THE SCHOOL OF PHARMACY

THE UNIVERSITY OF WISCONSIN, MADISON

TITLE: Identifying molecular mechanisms of prostate cancer using transposon-mediated mutagenesis and mouse models

SUMMARY: Using the **Sleeping Beauty (SB) transposon system** as a genetic tool, my laboratory has generated new transgenic lines that express the SB transposase in prostate epithelial cells. We have used these lines to conduct **somatic mutagenesis** screens to discover new genes important for prostate cancer development and/or progression. This work identified *phosphodiesterase 4d (PDE4D)* as a candidate prostate cancer driver gene and as a candidate drug target in prostate cancer. In related studies, we identified *MAGI2* as a candidate driver gene and biomarker for castration resistant prostate cancer. Ongoing research includes further characterization of the molecular pathways impacted by *PDE4D* and *MAGI2* in prostate cancer as well as further development of mouse models for human prostatic diseases.



HOSTED BY:

JILL MACOSKA, CPCT DIRECTOR