Conference Title. "Tangled in Knot Theory".

Initials. PQ.

Title. Partial Quadratics, their Pushwards, and Signature Invariants for Tangles.

Abstract. Following a general discussion of the computation of zombians of unfinished columbaria (with examples), I will tell you about my recent joint work with Jessica Liu on what we feel is the "textbook" extension of knot signatures to tangles, which for unknown reasons, is not in any of the textbooks that we know.

$u = Re\sqrt{w}$ $\quad w = e^{it}$

$u = \cos t/2 \quad \cos t = 2u^2 - 1$

$\sin t = \sqrt{1-(2u^2-1)^2} = \sqrt{4u^2-4u^4}$

$= 2u\sqrt{1-u^2}$