PREPARATION AND SPECTRAL PROPERTIES OF 1,3-BISAROMATIC-IMINO-2,2,4,4-TETRAMETHYLCYCLOBUTANES. R. M. Rohring (C. Maggiulli Fellow and Dan Pasto Co-op Research Fellow), A. Chong and J.J. Worman*, Department of Chemistry, rmr6319@rit.edu, jjwsch@rit.edu

The α-bisnapthyl and β-bisanthryl derivatives were prepared using a standard synthetic procedure.

\[
\begin{align*}
\text{O} & \quad \text{CH}_3 \\
\text{H}_3 & \quad \text{C} \\
\text{H}_3 & \quad \text{C} \\
\text{O} & \quad \text{O} \\
\text{H}_3 & \quad \text{C} \\
\text{H}_3 & \quad \text{C} \\
\end{align*}
\begin{align*}
\text{NH}_2 & \quad \text{R} \\
\text{N} & \quad \text{N} \\
\text{H}_3 & \quad \text{C} \\
\text{H}_3 & \quad \text{C} \\
\text{H}_3 & \quad \text{C} \\
\text{H}_3 & \quad \text{C} \\
\end{align*}
\]

\[\text{R} = \begin{array}{c}
\text{\textbullet} \\
\text{\textbullet} \\
\text{\textbullet} \\
\text{\textbullet} \\
\end{array} \quad \text{or} \quad \begin{array}{c}
\text{\textbullet} \\
\text{\textbullet} \\
\text{\textbullet} \\
\text{\textbullet} \\
\end{array}\]

Compounds were purified by removal of the starting diketone through sublimation followed by standard recrystalization. Spectral properties and elemental analysis were consistent for the structures shown. Fluorescence spectra show the n→π* emissions occur in the visible region, with the more conjugated β-bisanthryl emitting at lower energy. Derivatives of these compounds offer significant potential for application as OLEDs.