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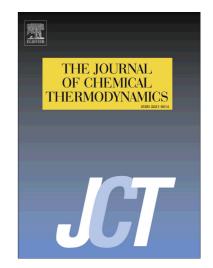
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# **ACCEPTED MANUSCRIPT**

### Densities at high pressures and derived properties of thiophenes

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#### **Abstract**

This contribution reports the densities in wide temperature (from 283.15 to 338.15 K) and pressure (from 0.1 to 65.0 MPa) ranges of four members of the thiophene family (thiophene, 2-methylthiophene, 3-methylthiophene and 2,5-dimethylthiophene). These densities have been satisfactorily correlated by means of the TRIDEN equation. From these data, several derived properties as isobaric expansibility, isothermal compressibility, and internal pressure have been estimated. Using all these properties, interesting information about molecular organization can be deduced.

**Keywords:** Density; 2,5-Dimethylthiophene; 2-Methylthiophene; 3-Methylthiophene; Thiophene.

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