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Analytical and graphical interdependence of critical temperatures for carboxylic acids on the number of carbon atoms in the molecule

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Abstract

Analytical description of interdependence of critical temperatures of n-acids (with carboxylic group at the first atom of carbon), on the number of carbon atoms in the molecule of the acid was carried out. Critical temperatures were calculated using the derived equations and analytical dependences were plotted up to the number of carbon (n) atoms equal to 100, for which the data on n > 20 have not been described in scientific and reference literature.