

Fig. 1. Optimized structural model of bitumen from coal hydrogenation ($C_{65}H_{65}NO$, with 12 aromatic and saturated rings).

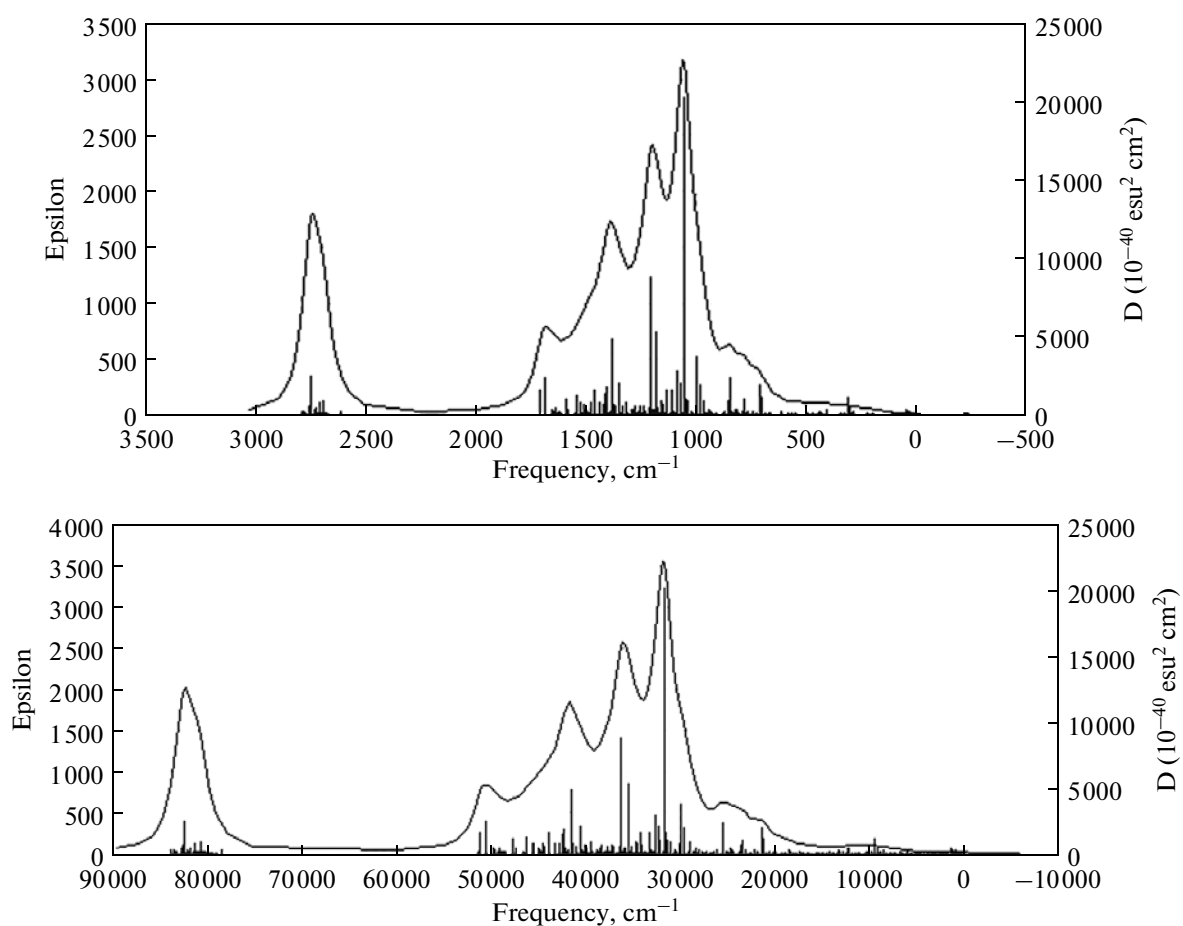


Fig. 2. IR spectrum of the structural model of bitumen.