Graph immersions are a natural counterpart to the widely studied concepts of graph minors and topological graph minors, and yet their theory is much less developed. In the present work we search for sufficient conditions for the existence of the immersions and the properties of the graphs avoiding an immersion of a fixed graph.

We prove that large tree-with of 4-edge-connected graph implies the existence of immersion of any 4-regular graph on small number of vertices and that large maximum degree of 3-edge-connected graph implies existence of immersion of any 3-regular graph on small number of vertices.