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Multiphase Flow in Porous Media: Simulation, Experiment and Application

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Deadline for manuscript submissions:

6 January 2025



This Special Issue aims to present and disseminate the latest advancements in the field of multiphase porous flow and explore future development directions.

Topics of interest include, but are not limited to, the following:

- Existence and characterization of multiphase fluids in micro-nanopores;
- Phase transition mechanism and mathematical modeling;
- Influence of temperature and stress on multiphase porous flow;
- Multiphase porous flow in ultra-deep oil and gas reservoirs;
- New technology and application of fluid phase change control;
- Multiphase porous flow-related enhanced oil recovery;
- Ice water phase transition in permafrost engineering;
- Water gas seepage in unsaturated soil;
- Gas water two-phase seepage in solid waste engineering;
- Software development and numerical simulation of multiphase flow;
- Numerical simulation and software development;
- Artificial intelligence and big data applications.





mdpi.com/si/210351





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