New viscosity-projection methods
for solving variational inquality problems
with applications to image restoration problems

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Abstract: This research investigates two new viscosity-projection methods for solving variational inquality problems ($VIPs$) with applications to image restoration problems via approximation projection in a real Hilbert space. We design the viscosity Mann-type iteration progress accelerated approximation projection rule to solve the pseudomonotone $VIPs$. Then, we present two strongly convergent algorithms that can be easily implemented, as examples for solving image restoration problems. Numerical experiments illustrate and compare the performances of the proposed algorithms with three other well-known algorithms.

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