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### (A) 期刊論文

1. **Chieh-Sen Huang**, Todd Arbogast, and Chen-Hui Hung. A semi-lagrangian finite difference WENO scheme for scalar nonlinear conservation laws. *Journal of Computational Physics*, 322:559–585, 2016. [SCI,NSYSU].
2. **Chieh-Sen Huang**, Feng Xiao, and Todd Arbogast. Fifth order multi-moment weno schemes for hyperbolic conservation laws. *Journal of Scientific Computing*, 64(2):477–507, 2015. [SCI,NSYSU].
3. **Chieh-Sen Huang**, Todd Arbogast, and Chen-Hui Hung. A re-averaged weno reconstruction and a third order cweno scheme for hyperbolic conservation laws. *Journal of Computational Physics*, 262:291–312, 2014. [SCI,NSYSU].
4. C.S. Chen, **Chieh-Sen Huang**, and K.H. Lin. On the convergence of the MFS-MPS scheme for 1D Poisson's equation. *International Journal of Computational Methods*, 10(2), 2013. 1341006 [SCI,NSYSU].
5. Todd Arbogast, **Chieh-Sen Huang**, and C.H. Hung. A fully conservative Eulerian-Lagrangian Stream-Tube method for advection-diffusion problems. *SIAM Journal on Scientific Computing*, 34(4):B447–B478, 2012. [SCI,NSYSU].
6. **Chieh-Sen Huang**, Todd Arbogast, and J. Qui. An Eulerian-Lagrangian WENO finite volume scheme for advection problems. *Journal of Computational Physics*, 231:4028–4052, 2012. [SCI,NSYSU].
7. Todd Arbogast, **Chieh-Sen Huang**, and T.F. Russell. A locally conservative streamline method for a model two-phase flow problem in a one-dimensional porous medium. *SIAM Journal on Scientific Computing*, 34(4):A1950–A1974, 2012. [SCI,NSYSU].
8. **Chieh-Sen Huang**, Y. C. Huang, and P. J. Lai. Modified genetic algorithms for solving fuzzy flow shop scheduling problems and their implementation with CUDA. *Expert Systems With Applications*, 39(5):4999–5005, 2012. [SCI,NSYSU].
9. Z.C. Li, H.-T. Hung, **Chieh-Sen Huang**, T.-T. Lu, and Q. Fang. Effective condition number of finite difference method for poisson's equation involving boundary singularities. *Numerical Functional Analysis and Optimization*, 32(6):659–681, 2011. [SCI,NSYSU].
10. **Chieh-Sen Huang** H.-D. Yen and A.H.-D. Cheng. On the increasingly flat radial basis function and optimal shape parameter for the solution of elliptic PDEs. *Engineering Analysis with Boundary Elements*, 34(9):802–809, 2010. [SCI,NSYSU](2009 Impact Factor: 1.531).
11. Todd Arbogast and **Chieh-Sen Huang**. A fully conservative Eulerian-Lagrangian method for a convection-diffusion problem in a solenoidal field. *Journal of Computational Physics*, 229:3415–3427, 2010. [SCI,NSYSU](2009 Impact Factor: 2.369).
12. **Chieh-Sen Huang**, C. H. Hung, and S. Wang. On convergence of a fitted finite volume method for the valuation of options on assets with stochastic volatilities. (Advance Access published 2009) *IMA Journal of Numerical Analysis*. doi:10.1093/imanum/drp016[SCI,NSYSU](2008 Impact Factor: 1.405).
13. S. Wang and **Chieh-Sen Huang**. A power penalty method for solving a nonlinear parabolic complementarity problem. *Nonlinear Analysis Series A: Theory, Methods & Applications*, 69(4):1125–1137, 2008. [SCI,NSYSU](2007 Impact Factor: 1.097).
14. Todd Arbogast and **Chieh-Sen Huang**. Improved accuracy for alternating-direction methods for Parabolic equations based on regular and mixed finite elements. *Mathematical Models and Methods in Applied Sciences*, 17:1279–1305, 2007. [SCI,NSYSU](2007 Impact Factor: 1.671).

15. C. S. Chen, C. F. Lee, and **Chieh-Sen Huang**. Error estimate, optimal shape factor, and high precision computation of multiquadric collocation method. *Engineering Analysis with Boundary Elements*, 31:614–623, 2007. [SCI,NSYSU](2007 Impact Factor: 0.936).
16. C. S. Chen, Sungwook Lee, and **Chieh-Sen Huang**. Derivation of particular solutions using Chebyshev polynomial based functions. To appear in *International Journal of Computational Methods*. [NSYSU].
17. Todd Arbogast and **Chieh-Sen Huang**. A fully mass and volume conserving implementation of a characteristic method for transport problems. *SIAM Journal on Scientific Computing*, 28(6):2001–2022, 2006. [SCI,NSYSU](2007 Impact Factor: 1.784).
18. **Chieh-Sen Huang**, S. Wang, C. S. Chen, and Z. C. Li. A radial basis collocation method for Hamilton-Jacobi-Bellman equations. *Automatica*, 42:2201–2207, 2006. [SCI,NSYSU](2007 Impact Factor: 2.083).
19. **Chieh-Sen Huang**, C. H. Hung, and S. Wang. A fitted finite volume method for the valuation of options on assets with stochastic volatilities. *COMPUTING*, 77(3):297–320, 2006. [SCI,NSYSU](2007 Impact Factor: 0.880).
20. Zi-Cai Li, **Chieh-Sen Huang**, and R. C. D. Chen. Interior boundary conditions in the schwarz alternating method for the trefftz method. *Engineering Analysis with Boundary Elements*, 29(5):477–493, 2005. [SCIE,NSYSU](2005 Impact Factor: 0.894).
21. **Chieh-Sen Huang**, S. Wang, and K. L. Teo. On application of an alternating direction method to Hamilton-Jacobin-Bellman equations. *Journal of Computational and Applied Mathematics*, 166(1):153–166, 2004. [SCIE,NSYSU](2004 Impact Factor: 0.486).
22. Jr Jim Douglas, **Chieh-Sen Huang**, and Anna M. Spagnuolo. Fractally fractured porous media and nuclear contamination. *Computational and Applied Mathematics*, 21:409–428, 2002. [NSYSU].
23. Jr Jim Douglas and **Chieh-Sen Huang**. A locally conservative eulerian-lagrangian finite difference method for a parabolic equation. *BIT*, 41(3):480–489, 2001. [SCI, NSYSU].
24. **Chieh-Sen Huang**. Convergence analysis of a mass-conserving approximation of immiscible displacement by a modified method of characteristics with adjusted advection. *Computational Geosciences*, 4(2):165–184, 2000. [SCIE,NSYSU].
25. **Chieh-Sen Huang**, K. L. Teo, and S. Wang. Solving hamilton-jacobi-bellman equations by a modified method of characteristics. *Nonlinear Analysis*, 40:279–293, 2000. [SCI, NSYSU].
26. Jr., Jim Douglas, **Chieh-Sen Huang**, and Felipe Pereira. The modified method of characteristics with adjusted advection. *Numerische Mathematik*, 83:353–369, 1999. [SCI, NSYSU].
27. Jr., Jim Douglas and **Chieh-Sen Huang**. Accelerated domain decomposition iterative procedures for mixed methods based on Robin transmission conditions. *Calcolo*, 35:131–147, 1998. [NSYSU].
28. Jr., Jim Douglas and **Chieh-Sen Huang**. An accelerated domain decomposition procedures based on Robin transmission conditions. *BIT*, 37:678–686, 1997. [SCI].