

CURRICULUM VITAE

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HONORS AND AWARDS:

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PUBLICATIONS:

REFEREED RESEARCH ARTICLES:

1. Hong, J-s., Hunt, A. G., Masters, P. S., and Lieberman, M. A. (1979). Requirement of acetyl phosphate for the binding protein-dependent transport systems in *Escherichia coli*. *Proceedings of the National Academy of Sciences USA* 75, 1213-1217.
2. Hunt, A. G. and Hong, J-s. (1980). A micromethod for the determination of acetyl phosphate and acetyl coenzyme A. *Analytical Biochemistry* 108, 290-294.
3. Hunt, A. G. and Hong, J-s. (1981). The reconstitution of binding protein-dependent active transport of glutamine in isolated membrane vesicles from *Escherichia coli*. *Journal of Biological Chemistry* 256, 11988-11991.
4. Hunt, A. G. and Hong, J-s. (1983). Properties and characterization of binding protein-dependent active transport of glutamine in isolated membrane vesicles of *Escherichia coli*. *Biochemistry* 22, 844-850.
5. Hunt, A. G. and Hong, J-s. (1983). Involvement of histidine and tryptophan residues of glutamine binding protein in the interaction with membrane-bound components of the glutamine transport system of *Escherichia coli*. *Biochemistry* 22, 851-854.
6. Hunt, A. G., Simplaceanu, V., Hong, J-s., and Ho, C. (1983). Phosphorus-31 nuclear magnetic resonance investigation of membrane vesicles from *Escherichia coli*. *Biochemistry* 22, 6130-6134.
7. Hunt, A. G., Chu, N. M., Odell, J. T., Nagy, F., and Chua, N.-H. (1987). Plant cells do not properly recognize animal gene polyadenylation signals. *Plant Molecular Biology* 8, 23-35.
8. Schardl, C., Byrd, A. D., Benzion, G. B., Altschuler, M. A., Hildebrand, D. F., and Hunt, A. G. (1987). Design and construction of a versatile system for the expression of foreign genes in plants. *Gene* 61, 1-11.
9. Maiti, I. B., Hunt, A. G., and Wagner, G. J. (1988). Seed-transmissible expression of mammalian metallothionein in transgenic tobacco. *Biochemical and Biophysical Research Communications* 150, 640-647.
10. Hunt, A. G. (1988). Identification and characterization of cryptic polyadenylation sites in the 3' region of a pea ribulose-1,5-bisphosphate carboxylase small subunit gene. *DNA* 7, 329-336.
11. Domier, L. L., Franklin, K. M., Hunt, A. G., Rhoads, R. E., and Shaw, J. G. (1989). Infectious *in vitro* transcripts from cloned cDNA of the potyvirus, tobacco vein mottling virus. *Proceedings of the National Academy of Sciences USA* 86, 3509-3513.
12. Graybosch, R., Hellmann, G. M., Shaw, J. G., Rhoads, R. E., and Hunt, A. G. (1989). Expression of a potyvirus non-structural protein in transgenic tobacco. *Biochemical and Biophysical Research Communications* 160, 425-432.
13. Hunt, A. G. and MacDonald, M. (1989). Deletion analysis of the polyadenylation signal of a pea ribulose-1,5-bisphosphate carboxylase small subunit gene. *Plant Molecular Biology* 13, 125-138.
14. Berger, P., Hunt, A. G., Domier, L. L., Hellmann, G. M., Stram, Y., Thornbury, D., and Pirone, T. P. (1989). Expression in transgenic plants of a viral gene product which mediates insect transmission of potyviruses. *Proceedings of the National Academy of Sciences USA* 86, 8402-8406.
15. Maiti, I. B., Wagner, G. J., Yeagan, R., and Hunt, A. G. (1989). Inheritance and expression of the mouse metallothionein gene in tobacco: Impact on Cd tolerance and tissue Cd distribution in seedlings. *Plant Physiology* 91, 1020-1023.
16. Murphy, J. F., Rhoads, R. E., Hunt, A. G., and Shaw, J. G. (1990). The VPg of tobacco etch virus RNA is the 49-kDa proteinase or the N-terminal 24 kDa part of the proteinase. *Virology* 178, 285-288.
17. Mogen, B., Graybosch, R., MacDonald, M., and Hunt, A. G. (1990). Upstream sequences other than AAUAAA are required for efficient mRNA 3' end formation in plants. *The Plant Cell* 2, 1261-1272.

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19. Hunt, A. G., Mogen, B., Chu, N. M., and Chua, N.-H. (1991). The SV40 small t intron is accurately and efficiently spliced in tobacco cells. *Plant Molecular Biology* 16, 375-380.
20. Maiti, I. B., Wagner, G. J., and Hunt, A. G. (1991). Light-inducible and tissue-specific expression of a chimeric mouse metallothionein cDNA in tobacco. *Plant Science* 76, 94-107.
21. MacDonald, M. H., Mogen, B., and Hunt, A. G. (1991). Characterization of the polyadenylation signal of the T-DNA-encoded octopine synthase gene. *Nucleic Acids Research* 19, 5575-5581.
22. Yang, J. and Hunt, A. G. (1992). Purification and characterization of a 70 kD polyadenylate-binding protein from pea (*Pisum sativum*). *Plant Physiology* 98, 1115-1120.
23. Yeargan, R., Maiti, I. B., Nielsen, M. T., Hunt, A. G., and Wagner, G. J. (1992). Tissue partitioning of Cd in transgenic tobacco seedlings and field plants expressing the mouse metallothionein I gene. *Transgenic Research* 1, 261-267.
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60. Addepalli, B. and Hunt AG. (2008) The interaction between two *Arabidopsis* polyadenylation factor subunits involves an evolutionarily-conserved motif and has implications for the assembly and function of the polyadenylation complex. *Protein and Peptide Letters* 15, 76-88.
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63. Zhang J, Addepalli B, Yun K-Y, Hunt AG, Rao S, Xu R, Li QQ, Falcone DL. (2008) Differential RNA processing implicated in responses of *Arabidopsis thaliana* to oxidative stress: a stress-tolerant mutant is deficient in a calmodulin-regulated RNA-binding protein. *PLoS ONE* 3, e2410.
64. Addepalli B, Hunt AG. (2008) Nuclease activity is a common characteristic of *Arabidopsis* CCCH-containing zinc finger proteins. *FEBS Letters* 582, 2577-2582.

INVITED REVIEWS AND BOOK CHAPTERS:

1. Hunt, A. G. and Hong, J-s. (1981). The energetics of osmotic shock-sensitive transport in *Escherichia coli*. in Membranes and Transport: A Critical Review, Volume II (A. N. Martonosi, ed., Plenum, N. Y.).
2. Hunt, A. G. (1986) A micromethod for the measurements of acetyl phosphate and acetyl coenzyme A. *Methods in Enzymology* 122, 43-50.
3. Hunt, A. G. and Hong, J-s. (1986) Periplasmic binding protein-dependent active transport in isolated bacterial membrane vesicles. *Methods in Enzymology* 125, 302-309.
4. Hildebrand, D. F., Altschuler, M., Bookjans, G., Benzion, G., Hamilton-Kemp, T. R., Andersen, R. A., Rodriguez, J. G., Polacco, J. C., Dahmer, M. L., Hunt, A. G., Wang, X., and Collins, G. B. (1987) Transformational analysis of lipoxygenases. in The Metabolism, Structure, and Function of Plant Lipids (P. K. Stumpf, J. B. Mudd, and W. D. Nes, eds., Plenum Publishing Corporation, NY).
5. Shaw, J. G., Hunt, A. G., Pirone, T. P., and Rhoads, R. E. (1990) Organization and expression of potyviral genomes. in Viral Genes and Plant Pathogenesis (T. P. Pirone and J. G. Shaw, eds., Springer-Verlag, New York, NY), pp. 107-121.
6. Maiti, I. B. and Hunt, A. G. (1992) Developing genetically engineered disease, pest, and herbicide resistance. *Recent Advances in Tobacco Science* 18, 45-68.
7. Hunt, A. G. (1994) Messenger RNA 3' end formation in plants. *Annual Review of Plant Physiology and Plant Molecular Biology* 45, 47-60.
8. Maiti, I.B. and Hunt, A. G. (1996) Genetically engineered resistance to potyviruses. in Technology Transfer of Plant Biotechnology. P. M. Gresshoff, ed., CRC Press, Boca Raton, FL. pp. 51-65.
9. Li, Q.-S. and Hunt, A. G. (1997) Polyadenylation of mRNA. *Plant Physiology* 115, 321-325.
10. Hunt, A. G. and Messing, J. (1998) Messenger RNA 3' end formation in plants. in A Look Beyond Transcription: Mechanisms Determining mRNA Stability and Translation in Plants. Proceedings of the 19th UC-Riverside Annual Symposium on Plant Physiology. Riverside, CA 1997. pp. 29-39.
11. Hunt, A. G. and Maiti, I. B. (2001) Strategies for the expression of multiple foreign genes in plants as polycistronic constructs. *In Vitro Cellular and Developmental – Plant* 37, 313-320.
12. Hunt, A. G. (2007) Messenger RNA 3'-end formation and the regulation of gene expression. in Regulation of Gene Expression in Plants - The Role of Transcript Structure and Processing. (C. Bassett, ed., Springer). pp 101-122. ISBN: 978-0-387-35449-1.
13. Wang, W.-X., Gaffney, B., Hunt, A. G., and Tang, G. (2007) MicroRNAs (miRNAs) and Plant Development. in Encyclopedia of Life Sciences (John Wiley and Sons). doi: 10.1002/9780470015902.a0020106
14. Hunt, AG. 2008. Messenger RNA 3' End Formation in Plants. in Nuclear pre-mRNA Processing in Plants, Current Topics in Microbiology and Immunology 326 (M. Golovkin and ASN Reddy, eds., Springer-Verlag Berlin Heidelberg 2008), pp 151-177.

PATENTS AND INVENTIONS:

- U.S. Patent # 6,018,106 - Use of yeast poly(A) binding proteins and their genes for broad-range protection of plants against bacterial, fungal, and viral pathogens (co-inventors: Qingshun Li, Carol von Lanken, and Jianjun Yang)
- U.S. Patent # 6,342,654 - Use of HrmA proteins and their genes for broad-range protection of plants against bacterial, fungal, and viral pathogens (co-inventors: Qingshun Li, Songhei Shen, and Sheng Yang He)
- U.S. Patent # 6,476,293 - Use of bacterial acetate kinases and their genes for protection of plants against different pathogens (co-inventors: Santanu Dasgupta, Qingshun Li, Christopher Lawrence, and Glenn B. Collins)