

# JIN TONG

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## *Summary of Qualifications*

- Intensive research experiences in molecular biology in academic research entity, with full-length essential techniques such as **PCR, RT-PCR, Q-rtPCR, Southern blot, DNA/RNA hybridization, construct of DNA, and gene transformation through agrobacterium mediation.**
  - Seven-year employment in a pharmaceutical company specialized in analytical chemistry and instrumental analysis (**HPLC, GC, UV-spectrophotometer**), plus quality control and quality assurance, **GMP/GLP** management experience
  - General laboratory management experiences involving safety, chemical inventory, ordering and documentation
  - Proficiency computer skill in Microsoft **Word, Excel, PowerPoint etc.**; technical software Primer Express, Vector NTI 10, PeakScanner
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## *Professional Experiences*

**Research assistant** –Crop Science Department, North Carolina State University  
*05/2009 - present*

*Recent project involved:*

Kane project of Bayer Crop Science - Genetic modify Turf grass for herbicide resistant and drought tolerance and male sterility by Agrobacterium-mediated transformation

*Major duties:*

- Plant tissue culture include adjustment and evaluation of medium to achieve the best plant tissue culture for transformation; maintain the best quality of calluses by recognizing and sub-culturing the good calluses with microscope or without microscope; optimize the protocol through different approaches to achieve high transient and transformation efficiency
- Performed digestion, ligation, PCR, TOPO cloning to construct plasmid DNA; test construct and confirm construct
- Prepared agrobacterium cell culture to make competent cell for constructed DNA
- Performed extraction of DNA, RNA; PCR; RT-PCR; Southern blot; MUG Assay to test the gene expression
- Practiced and tested the new methodology on rice, soybean and Arabidopsis thaliana to confirm the high throughput transformation efficiency on other plants
- Collected and documented plenty of data for further data analysis

**Research specialist** -- Forestry Department, North Carolina State University  
*11/2005 – 05/2009*

*Projects involved:*

- An epigenetic project with pine tree to test methylation of CpG islands using advance Illumina Solexa sequencing technique
- Loblolly pine *Cad* gene mutants screening
- Gene *Short-root*, *Scarecrow* regulation pass way of primary root and lateral root formation, including the phenotype data collection of gene expression profiling in primary root and lateral formation in Popular model tree
- DNA sequencing project of Abies fir phylogenetics study

*Major duties:*

- Performed, in a leading role, major molecular biology experiment involving **DNA/RNA manipulation; molecular cloning; Southern blotting, in situ hybridization, SNP detection, PCR, RT-PCT, Quantitative Real-Time PCR**
- Adapted, modified and optimized experimental protocols for ultimate performance
- Maintained **plant tissue culture**, performed phenotype and genotype testing and collected and analyzed data
- Collaborated, assisted and partially supervised temporary visiting scholars and students
- Performed routine laboratory maintenance, reagent and supply ordering, maintained and calibrated all analytical equipment and instruments

**Special volunteer researcher** -- National Institute of Environmental Health Sciences, Laboratory of Pharmacology and Chemistry  
**12/2004 – 05/2005**

- Research on the pathogenesis of several neurological disorders involving basic cell biology and molecular biology techniques; performed **mammalian cell culture**; molecular cloning, DNA manipulation; routine assay including ROS, SOD assay; established stable cell lines

**Senior instrumental analyst** -- Tianjin Smith Kline & Beechan Pharmaceutical Company Ltd. (current Glaxo-Smith Kline), Quality Control and Assurance Department of Chemical Plant  
**02/1992 -- 08/1998**

*Major duties:*

- Performed routine instrumental analysis on chemical products and intermediate products using **HPLC, GC, UV spectrophotometer and IR etc. including daily minor instrument maintenance and repairing**
- Performed waste water routine analysis, including chemical assay using **GC** and microbiological testing
- Constructed and maintained **SOP** and other quality control regulations, enhancement of **GMP, GLP** for IS9000 verification
- Trained personnel for better performance on chemical instruments

**Chemist I** – Skylake Germany-Sino Joint-venture Food Ltd. Company, Quality Control Department  
**07/1990 – 01/1992**

*Major duties:*

- Performed routine analysis on food products of food nutrient using HPLC, titration

- Executed microbiological testing in process and completed products
  - Quality assurance of following of SOP and the enhancement of GMP on food processing, storage and transportation
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### ***Education***

B.S. major in Commodity Inspection and Protection in Commercial Economy Department, Tianjin Finance and Economy Institute. **08/1986 --07/1990**

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### ***Reference:***

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