

# DMNS FAIR

Queens College, City University of New York  
Division of Mathematics and Natural Sciences  
Faculty Achievement In Research

**MY NAME: Chuixiang Yi**

**MY DEPARTMENT: SEES**

**SOMETHING INTERSTING ABOUT ME (OPTIONAL, MAY BE LEFT BLANK):**

**MY RESEARCH (IN SIMPLE WORDS THAT CAN BE UNDERSTOOD BY ANYONE ON THE Q64 BUS):**

My research overall is to determine what are the most important controls of the net flow of carbon into or out of ecosystems. My research approach is modeling based on field observation. We found that temperature is the most important control of the carbon flow in high latitudes, while water is the most important control of the carbon flow in low latitudes. We predict that the carbon flow from atmosphere into ecosystems will be enhanced in high latitudes from global warming effects and will be prohibited in low latitudes in the 21<sup>st</sup> century.

**MY RESEARCH IN 140 CHARACTERS (OPTIONAL, MAY BE LEFT BLANK):**

**How climate changes modify land-atmosphere carbon exchanges in 21<sup>st</sup> century.**