# TECHNOLOGY AND STUDENT PROFESSIONAL DEVELOPMENT: ELECTRONIC REVERSE AUCTIONS (eRA)

Kathryn Dobie and Jacqueline Williams, North Carolina A&T State University

Curtis Wynn, RFQHosting

Denise James Gatling, GlaxoSmithKline

The economic downturn and loss of jobs stemming from the failure of more than 50 Fortune Five Hundred firms and untold numbers of smaller enterprises since 2008 has become the new reality. Efforts to reenergize the sluggish economy must encompass entrepreneurial small businesses in concert with a multitude of medium and large businesses to produce new ideas and their associated new jobs.

The development of efficient supply chains hinges on the ability to identify and conduct business with companies of various sizes and states of development in far flung locations. As companies of all sizes face the duel tasks of managing an ever expanding supply chain and reducing costs, technology becomes an indispensable tool for sales and supply management professionals. Many transactions that could be conducted as traditional face-to-face negotiations are now candidates for online, real-time auctions between buying organizations and two or more invited suppliers. The emerging technology for sourcing, such as an on-line bidding process, is often augmented with traditional face-to-face meetings, teleconferencing, and/or emails.

Electronic reverse auctions are increasingly being used by firms to improve firm financial and operational performance. With every major industry using e-sourcing technology, the rapid growth of this sourcing effort underscores the need to expose business students (specifically, both professional sales and purchasing students) to its influence --- opportunities, issues, and consequences -- on buyer-seller dynamics. The desired result of this exposure is to enhance the competencies of the graduates as they prepare for the duties and responsibilities assumed as supply chain professionals.

#### Impact on Business Growth

A major impediment to the growth of small business enterprises is their inability to participate in the bidding process for contracts and subcontracts due to their smaller size and, in some cases, inexperience. Conversely, primary contractors are unable to identify businesses that would be able to participate as subcontractors simultaneously filling the need for qualified candidates that are ready, willing, and able to perform/provide the required goods and services and also fulfill the requirements

for the use of underutilized business enterprises to meet the requirements of government and other contracts.

Electronic reverse auctions provide a means for bridging the differences in size, experience, location, and time between those businesses seeking partners from which to purchase products and services and companies with products and services that are available for sale. Buyers and sellers do not have to have to be in the same location for either sealed bid or active auction events. Auctions can be conducted in as short or long period of time as is appropriate for the event. The bidding process is transparent to the purchaser as well as the participating potential vendors.

## The Classroom Experience

The primary goal of the e-RA negotiation assignment is to provide students with an understanding of the motivations, challenges, and experiences of buyers and sellers using online reverse auctions based on a Business-to-Business context. The underlying rationale of asking students to participate in a reverse auction project was to help students acquire the capacity to act as a practicing e-commerce professional in the buyer and/or seller role. The learning activities were assigned across a 16 week semester timeline. In order to provide the greatest benefit, the classroom experience included a variety of experiential activities in addition to the actual reverse auction process.

# **Experiential Learning Activities**

- Lecture/Discussion
- Independent Research Papers and Presentations
- In-Class Speakers
- Negotiation Exercise
- Case Analysis
- Research Paper Presentations

A vital portion of the assigned research was to introduce students to the level of effort that must be expended learning about the purchasing company needs, product specifications and any competitors and competitor products that were available.

### Assigned Research Papers and Presentations

First research paper - become familiar with the broad area of e-business.

Second research paper - distinguish the differences between RFQ, RFP, RFI, and Sealed Bids

Third research paper - company, product, and competitor analysis

- the product/service specifications of the selected product and service
- the identity of 3 potential suppliers for the product and the service
- the evaluation of each of the suppliers according to supplier criteria using either the categorical method, the cost-ratio method, or the linear averaging method

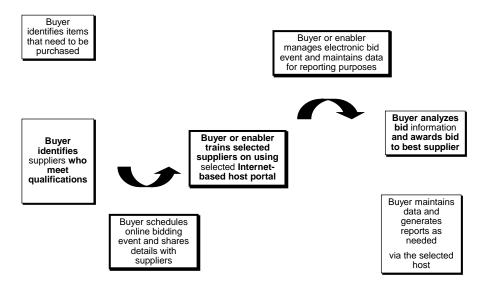
Fourth research paper - distinguish the differences between traditional purchasing methods and "e" purchasing methods

- the advantages and disadvantages of each
- how would you determine the appropriate application for each
- integrating traditional and "e" into a comprehensive purchasing strategy

#### eRA Process

The online reverse auction process follows the same model that is used in the traditional purchasing process. This provides a familiar path that is based on participating firms' purchasing and sales

# **Online Bid Event Process**



behaviors.