Success Story
Linux Print + Follow printing client

Country :	Poland
Industry :	Financial and insurance activities
Subject :	KDE-CR-17-076 – Customized Linux Printer Driver with Print + Follow support.

Background

The customer is a popular provider of financial and insurance services in Europe. They use web terminals with "Porteus Kiosk", which is a lightweight Linux operating system, which enables various restrictions for users of their organization.

Porteus Kiosk has been restricted to allow only use of the web browser. Furthermore, the browser has been locked down to prevent users from tampering with settings or downloading and installing software. When the kiosk boots it automatically opens Firefox or Google Chrome browser to your chosen home page. The history is not kept, no passwords are saved, and many menu items have been disabled for total security. When the browser is restarted, all caches are cleared and it reopens automatically with a clean session to ensure no trace of history is left. The employees using Porteus have to login to the company web portal. The users have a need for secure printing via a Print+Follow system from this web terminals. Unfortunately any modifications of the portal are not possible, so it is not possible to capture the login user name from the web application.

Challenge

Integration of that system with MyQ and enable print and follow operation for users operating from Porteus Kiosk stations. In order to enable print and follow operations it is inevitable to embed an ID or equip print jobs with such ID of the user, who shall be enabled to print the generated job from the printing device. Usually the user who shall be enabled to get the printed paper is the same person who generated the print job on the Porteus Kiosk system.

The only way to provide user name to the MyQ from such system is by adding a PJL 'command to the job header: '@PJL SET USERNAME="[user_name]"'. Since the user name is not known within the session, the only way to add the PJL command to the job header is to prompt for the user name every time the user prints in a pop-up window, which shows up upon print job initiation.

Solution

Kyocera offered a customized Linux Printer driver which prompts a user whenever a print job is generated to enter the user name.
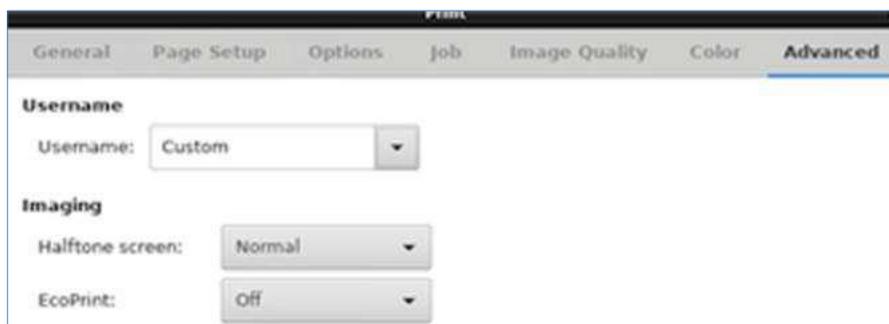
In case there is no user name entered, then the driver generates a print job embedding the PJL sequence @PJL SET USERNAME="guest". This will be interpreted by MyQ and the job will redirected into the "direct queue" and it will be printed out directly.

In case there is a user name entered, then the driver generates a print job embedding the PJL sequence @PJL SET USERNAME="<username>". This will be interpreted by MyQ and the print job will be redirected in the "follow me queue" where it resides until the appropriate user authenticated at the device and calls this job for printing.

Finally a Porteus ISO image could be generated and deployed, which contains the customized driver.