LIST ALL AUTHORS and AFFILIATIONS – underline presenting author
Kevin Campbell, Jennifer Kuo, Long Dang, Bruce Stechmiller, Michael Blute, Paul Crispen

TITLE
Contemporary Use and Outcomes of Neoadjuvant Chemotherapy Prior to Radical Cystectomy

BACKGROUND/AIMS:
Cisplatin based neoadjuvant chemotherapy (NAC) prior to radical cystectomy is associated with significant improvements in survival. However, the reported use of NAC has remained low at most centers. Our objective was to evaluate our centers use of NAC prior to cystectomy and identify possible predictors of the receipt of NAC.

METHODS: A retrospective review was performed for patients undergoing radical cystectomy for clinical stage II-III bladder cancer from the years 2011 through 2016. The following variables were evaluated: year of treatment, tumor histology, preoperative renal function, use of NAC, regimen of NAC, setting of NAC, and the rate of pathologic down staging.

RESULTS & CONCLUSIONS: A total of 212 patients were identified during our study period. The median age at the time of surgery was 70 years (IQR 63-77) and 79% were males. The average preoperative serum creatinine was 1.04 (IQR 0.86-1.41), and 19% (41/212) of patients had a preoperative creatinine of >1.5. The majority of patients, 89%, had tumor histology compatible with the use of NAC. Overall, 51% (108/212) of patients received NAC prior to cystectomy through the study period. The use of NAC increased significantly over time with a 39% utilization rate in 2011 and a 68% utilization rate in 2016, p = 0.0002. Patient gender, age, and pretreatment renal function were not associated with the use of NAC. Tumor histology was significantly associated with the use of NAC, p = 0.0019. Of patients receiving NAC, 19% did not receive a cisplatin based regimen. Receipt of NAC outside of our institution did not impact the use of a cisplatin based NAC regimen, 23% versus 15% (p=0.298). Pathologic down staging was noted in 28% (60/212) of patients overall. Pathologic down staging was noted in 38% of patients receiving NAC and 18% of patients undergoing cystectomy alone, p = 0.0015.

The use of NAC prior to radical cystectomy has significantly increased over time at our institution. Continued utilization of NAC will be pursued given the significant increase in pathologic down staging in cystectomy specimens.