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use; and hormonal or immunotherapy as first-line systemic therapy or unknown hormonal or immunotherapy use. Three groups were defined according to sequence of administration of surgery and systemic therapy. Overall survival (OS) was compared by calculating hazard ratios for death via Cox regression analysis. The Incomplete Treatment (IT) group received surgery alone, systemic therapy alone, or no treatment. The Primary Surgery (PS) group received surgery before systemic therapy. The Interval Surgery (IS) group had neoadjuvant systemic therapy followed by surgery, with or without further systemic therapy after surgery. Subanalyses were performed to assess the impact of post-IS systemic therapy, age, ethnicity, insurance status, and Charlson-Deyo score on OS. Analysis was performed using STATA.16.

Results: A total of 8,520 cases of FIGO Stage IV endometrial adenocarcinoma were identified using the criteria above. Median OS in months for each treatment sequence group was 7.2 for IT, 35.7 for PS, and 30.7 for IS. Regardless of treatment sequence, receiving both surgical and systemic therapy improved OS compared to receiving only one or neither treatment. The hazard ratio (HR) for death for PS compared to IT was 0.38 (95% CI 0.36-0.40) and for IS compared to IT was 0.41 (95% CI 0.36-0.47), $p < 0.0001$ for both. There was no significant difference in survival for IS compared to PS (HR 1.10, 95% CI 0.96-1.24, $p = 0.18$). Stratification of IS cases by administration of further systemic therapy after surgery yielded the same result. Patient groups with worse OS ($p < 0.0001$ for all) included: age > 50 years (HR 1.18, 95% CI 1.08-1.30), non-Hispanic Black compared to non-Hispanic White (HR 1.27, 95% CI 1.17-1.37), and presence of medical comorbidities reflected by Charlson-Deyo score of 1 or more. Patients with private insurance had better OS than uninsured patients (HR 0.80, 95% CI 0.71-0.90, $p < 0.0001$) but the same was not true for government insurance.

Conclusions: This retrospective survival analysis of NCDDB data for FIGO Stage IV endometrial adenocarcinoma illustrated a benefit to receiving both systemic and surgical treatment over receiving only one or neither form of therapy. No difference in mortality was identified between primary surgery with adjuvant systemic therapy and neoadjuvant systemic therapy with interval surgery, even when accounting for additional chemotherapy after surgery. The decision whether to begin treatment with surgery or chemotherapy will thus depend on nuanced clinical factors specific to each patient. Patient factors associated with worse mortality included age > 50 years, Non-Hispanic Black ethnicity, lack of insurance, and presence of medical comorbidities. These findings indicate a need to address the socioeconomic determinants of health contributing to these disparities in mortality.

270 - Poster Session

Emergency department utilization by gynecologic cancer patients during the COVID-19 pandemic: unintended improvements in the selective use of emergency care?

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Objectives: To evaluate the effects of the COVID-19 pandemic on emergency department (ED) utilization by gynecologic oncology patients in a large academic cancer center.

Methods: Institutional data were captured from the EMR for the first 4 months of the US COVID-19 pandemic (March-June 2020) and compared to a historical control (March-June 2019). Data were collected from three major hospitals within an urban academic health system. Patients were identified as those with a gynecologic cancer diagnosis and active treatment (chemotherapy and/or radiation) within the prior 180 days of ED encounter, with an outpatient oncology visit within the last 90 days. Data including number and location of emergency department visits, admission outcomes, primary ICD-10 emergency department diagnosis, payer type, and patient demographics were collected. Descriptive statistics were performed.

Results: Gynecologic oncology patients were significantly less likely to present to the ED for care during the first 4 months of COVID-19 ($n = 91$) when compared to a historical control ($n = 144$), $p < 0.01$. Patients presenting during COVID were more likely to be admitted (43/91 vs 47/144, $p < 0.01$), and to be kept for observation (18/43 vs 8/47, $p = 0.01$). Of patients who were admitted, those presenting during COVID were significantly more likely to require an ICU stay during admission (12/43 vs 5/47, $p = 0.04$). Six patients admitted during COVID (14%) died during their admission, while 3 patients (6%) died in the control group. There were no differences with respect to race, payor type, diagnosis, length of stay, or need for procedures when comparing patients admitted during COVID versus the control group. Four patients were COVID 19 positive during admission, which contributed to 1 patient death. Utilization of the health system's outpatient oncology urgent care center remained unchanged during COVID-19 ($n = 19$ vs. $n = 15$, $p = 0.43$).

Conclusions: Fewer gynecologic cancer patients presented to the ED during the COVID-19 pandemic, and those presenting had increased rates of indicated and complex care requirements. The concurrent stability in the outpatient urgent care center volume highlights a potential role for more stringent patient triaging to improve health-care utilization in this vulnerable population going forward.

