**Supplemental Table 6**. Is there an association between Leapfrog Safe Practices Score (SPS) and Hospital Readmission Reduction Program (HRRP) Readmission Adjustment Factor (RAF) or Total Hospital-Acquired Conditions Score? Odds ratios and 95% confidence intervals from censored linear regression models, by SPS measure

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | **#1: Leadership** | **#2: Feedback** | **#3: Training** | **#4: Risks & Hazards** | **#19: Hand hygiene** | **Total SPS** |
| **HOSPITAL READMISSION REDUCTION PROGRAM (HRRP) READMISSION ADJUSTMENT FACTOR (RAF) (N=1,098)** |
| **SAFE PRACTICES SCORE MEASURE (standardized)** | 0.043\* (-0.01, 0.08) | -0.003 (-0.04, 0.03) | 0.012 (-0.02, 0.05) | 0.021 (-0.02, 0.06) | 0.015 (-0.02, 0.05) | 0.023 (-0.01, 0.06) |
| **Teaching hospital?** *(Ref=No)* | 0.005 (-0.11, 0.12) | 0.014 (-0.10, 0.13) | 0.010 (-0.10, 0.12) | 0.009 (-0.10, 0.12) | 0.011 (-0.10, 0.12) | 0.006 (-0.11, 0.12) |
| **Bed size** *(Ref=<50)* |  |  |  |  |  |  |
| 50-200 | -0.274 (-0.68, 0.13) | -0.261 (-0.67, 0.15) | -0.270 (-0.68, 0.14) | -0.268 (-0.67, 0.14) | -0.270 (-0.68, 0.14) | -0.273 (-0.68, 0.13) |
| >200 | -0.182 (-0.59, 0.22) | -0.166 (-0.57, 0.24) | -0.175 (-0.58, 0.23) | -0.174 (-0.58, 0.23) | -0.176 (-0.58, 0.23) | -0.179 (-0.58, 0.23) |
| **Ownership** *(Ref=Public)* |  |  |  |  |  |  |
| Private, not for profit | -0.055 (-0.19, 0.08) | -0.049 (-0.19, 0.09) | -0.050 (-0.19, 0.09) | -0.046 (-0.18, 0.09) | -0.049 (-0.19, 0.09) | -0.050 (-0.19, 0.09) |
| Private, for profit | -0.160\* (-0.31, 0.01) | -0.150 (-0.30, -0.001) | -0.151\* (-0.30, 0.001) | -0.151\* (-0.30, -0.001) | -0.153\* (-0.30, -0.002) | -0.153\* (-0.30, -0.003) |
| **Safety net hospital?** | -0.035 (-0.15, 0.08) | -0.035 (-0.15, 0.08) | -0.035 (-0.15, 0.08) | -0.032 (-0.14, 0.08) | -0.034 (-0.15, 0.08) | -0.032 (-0.14, 0.08) |
| **BIC** | 2087.7  | 2093.0  | 2092.6  | 2091.9  | 2092.4  | 2091.6  |
| **HOSPITAL ACQUIRED CONDITIONS REDUCTION PROGRAM (HACRP) TOTAL HAC SCORE (N=1,095)** |
| **SAFE PRACTICES SCORE MEASURE (standardized)** | 0.053 (-0.05, 0.16) | -0.059 (-0.17, 0.05) | 0.028 (-0.08, 0.13) | 0.031 (-0.08, 0.14) | 0.076 (-0.03, 0.18) | 0.037 (-0.07, 0.14) |
| **Teaching hospital?** *(Ref=No)* | 1.185\*\*\* (0.86, 1.51) | 1.208\*\*\* (0.88, 1.53) | 1.187\*\*\* (0.86, 1.51) | 1.188\*\*\* (0.86, 1.51) | 1.180\*\*\* (0.86, 1.50) | 1.183\*\*\* (0.86, 1.51) |
| **Bed size** *(Ref=<50)* |  |  |  |  |  |  |
| 50-200 | 1.190\* (0.01, 2.37) | 1.215\* (0.04, 2.39) | 1.185\* (0.005, 2.37) | 1.194\* (0.02, 2.37) | 1.166 (-0.01, 2.34) | 1.186\* (0.01, 2.37) |
| >200 | 1.694\*\* (0.52, 2.87) | 1.721\*\* (0.55, 2.89) | 1.692\*\* (0.52, 2.87) | 1.700\*\* (0.53, 2.87) | 1.671\*\* (0.50, 2.84) | 1.691\*\* (0.52, 2.87) |
| **Ownership** *(Ref=Public)* |  |  |  |  |  |  |
| Private, not for profit | -0.194 (-0.59, 0.20) | -0.189 (-0.59, 0.21) | -0.189 (-0.58, 0.21) | -0.183 (-0.58, 0.21) | -0.191 (-0.59, 0.20) | -0.188 (-0.58, 0.21) |
| Private, for profit | -0.080 (-0.52, 0.36) | -0.073 (-0.51, 0.37) | -0.071 (-0.51, 0.37) | -0.070 (-0.51, 0.37) | -0.084 (-0.52, 0.36) | -0.073 (-0.51, 0.37) |
| **Safety net hospital?** | 0.224 (-0.10, 0.55) | 0.220 (-0.11, 0.54) | 0.215 (-0.11, 0.54) | 0.221 (-0.10, 0.55) | 0.224 (-0.10, 0.55) | 0.225 (-0.10, 0.55) |
| **BIC** | 4416.9  | 4416.7  | 4417.6  | 4417.5  | 4415.9  | 4417.4  |

Note: HRRP RAF ranges from 97 to 100 and indicates the percentage of Medicare reimbursement hospitals that are provided under HRRP. HAC Total Score ranges from 1 to 10, with higher scores indicating worse performing hospitals. Standardized regression coefficients reflect change in dependent variable for one standard deviation change in SPS measure; 95% confidence intervals are provided in parentheses. BIC=Bayesian Information Criterion. Evidence of association between SPS measures and outcomes evaluated using (1) measures of statistical significance, with p-values of less than 0.05 interpreted as statistically significant; and (2) effect size, evaluated as the change in odds of penalization for a metric change in SPS measure of interest.

\*p<0.05; \*\*p<0.01; \*\*\*p<0.001