

Assignment 3: Relational Algebra

I pledge my honor that I
have abided by the Stevens
Honor System - *Spargish*
Rana

$$1) \pi_{gname} (Guest \bowtie (\sigma_{date \geq "Jan 01" \wedge \sigma_{date} \leq "Jan 31"} \wedge \sigma_{year = "2020"} (Booking)) \bowtie (\sigma_{hcity = "NYC"} (Hotel)))$$

$$2) \pi_{gname} (Guest \bowtie (\sigma_{nights > 10} (Booking)) \bowtie (\sigma_{hcity = "NYC"} (Hotel)) \bowtie (\sigma_{rtype = "suite"} (Room)))$$

$$3) \pi_{gname} (Guest - (\pi_{gid} (\sigma_{nights > 5} (Bookings)) \bowtie Guest))$$

$$4) \pi_{hname} (Hotel - (Hotel \bowtie \pi_{nid} (\sigma_{year = "2020"} (Booking))))$$

$$5) \pi_{gname} (Guests \bowtie \pi_{gid} (PC(\pi_{gid, nid} (\sigma_{type = "suite"} (Booking \bowtie Room))) / PC(\pi_{nid} (\sigma_{type = "NYC"} (Hotel))))$$