

Submitted By:

Jashjeet Singh Madan,

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Student ID: 2000593600 | jsmadan@iu.edu

- 1) $\{s.sid, s.rating \mid sailor(s)\}$
- 2) $\{s.sid, s.sname, s.rating \mid sailor(s) \wedge ((s.rating \geq 2 \wedge s.rating < 8) \vee (s.rating > 10 \wedge s.rating \leq 11))\}$
- 3) $\{b.bid, b.name, b.color \mid boat(b) \wedge (\exists r \exists s (sailor(s) \wedge reserves(r) \wedge s.sid = r.sid \wedge b.bid = r.bid \wedge s.rating > 7 \wedge b.color \neq 'red'))\}$
- 4) $\{b.bid, b.bname \mid boat(b) \wedge (\exists r1.bid \mid reserves(r1) \wedge (r1.day = 'Saturday' \vee r1.day = 'Sunday')) \wedge \neg (\exists r2.bid \mid reserves(r2) \wedge r2.day = 'Tuesday')\}$
- 5) $\{r.sid \mid reserves(r) \wedge (\exists b (boat(b) \wedge r.bid = b.bid \wedge b.color = 'red')) \wedge (\exists r1.sid \mid reserves(r1) (\exists b1 (boat(b1) \wedge r1.bid = b1.bid \wedge b1.color = 'green'))))\}$
- 6) $\{s.sid, s.sname \mid sailor(s) \wedge (\exists r1 \exists r2 (reserves(r1) \wedge reserves(r2) \wedge r1.sid = r2.sid \wedge r1.bid \neq r2.bid \wedge r1.sid = s.sid))\}$
- 7) $\{r1.sid, r2.sid \mid reserves(r1) \wedge reserves(r2) \wedge r1.sid \neq r2.sid \wedge r1.bid = r2.bid \}$
- 8) $\{s.sid \mid sailor(s) \wedge \neg (\exists r.sid (reserves(r) \wedge (r.day = 'Monday' \vee r.day = 'Tuesday'))))\}$
- 9) $\{r.sid, b.bid \mid reserves(r) \wedge boat(b) \wedge r.bid = b.bid \wedge b.color \neq 'red' \wedge (\exists s (sailor(s) \wedge s.sid = r.sid \wedge s.rating > 6))\}$
- 10) $\{b.bid \mid boat(b) \wedge \neg (\exists r1 \exists r2 (reserves(r1) \wedge reserves(r2) \wedge r1.bid = r2.bid \wedge r1.sid \neq r2.sid))\}$
- 11) $\{s.sid \mid sailor(s) \wedge \neg (\exists r1 \exists r2 \exists r3 (reserves(r1) \wedge reserves(r2) \wedge reserves(r3) \wedge r1.sid = r2.sid \wedge r2.sid = r3.sid \wedge r1.bid \neq r2.bid \wedge r1.bid \neq r3.bid \wedge r2.bid \neq r3.bid))\}$