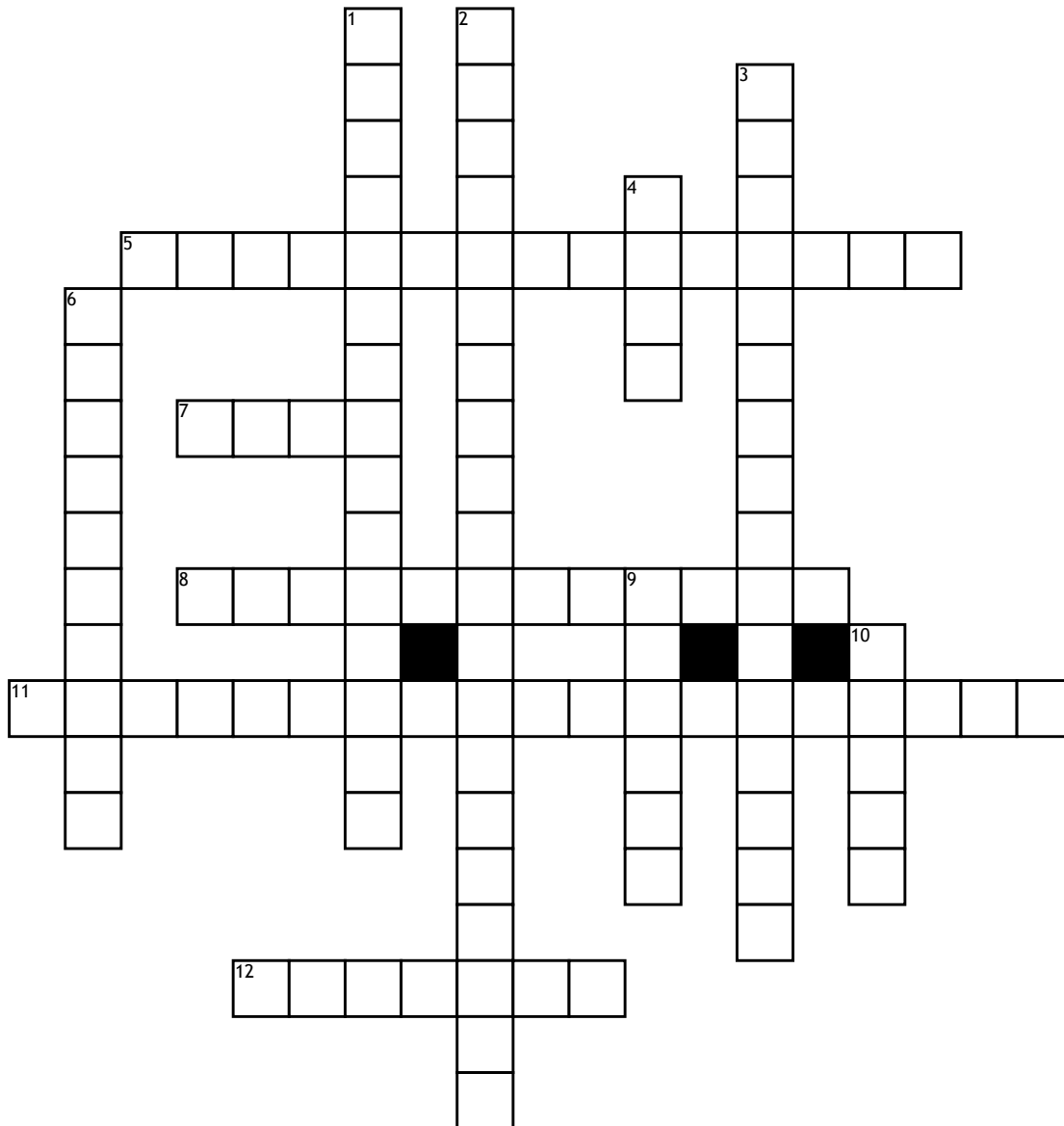


Aerospace Engineering



Across

- 5. "A body at rest will remain at rest, and a body in motion will remain in motion unless it is acted upon by an external force."
- 7. The wing of a plane creates a forward force on the air, which then creates an upward force on the wing.
- 8. _____ deals with the flight of manned and unmanned vehicles that travel outside the earth's atmosphere.
- 11. An increase in the speed of a fluid occurs simultaneously with a decrease in pressure or a decrease in the fluid's potential energy.

12. The weight is a force caused by the gravitational pull of earth.

Down

- 1. "For every action, there is an equal and opposite reaction."
- 2. _____ is a specific branch of engineering that focuses on developing spacecraft and aircraft.
- 3. "The force acting on an object is equal to the mass of that object times its acceleration." This is written in mathematical form as $F = ma$, where F is force, m is mass, and a is acceleration.
- 4. An aerodynamic force that acts against the movement of an aircraft.

- 6. Like a wing, it produces lift, but in a forward direction. Works like rotating wings that spin around a shaft.
- 9. the force that moves an aircraft through the air. In propeller planes or jet planes, air is being forced out of the rear of the plane, causing the plane to move forward.
- 10. An aircraft in flight is free to rotate in three dimensions: yaw - nose left or right, up and down, roll - side to side, and rotation - left and right