DECISION TREE RULES

1. IF battery is weak

THEN not enough current to start

1. IF not enough current to start

THEN car will not start 🡪

1. IF fuel is empty

THEN not enough fuel to start

1. IF not enough fuel to start

THEN car will not start 🡪

1. IF car starts

THEN problem = other

1. IF alternator fails

THEN car’s electrical system is impacted

1. if car’s electrical system is impacted

THEN car’s battery power will drain

1. if car’s battery drains

THEN not enough current to start

1. IF oil is empty

THEN Oil life will be triggered

1. IF oil life is triggered

THEN engine will fail  **→**

1. if oil is old

THEN engine parts will become too hot

1. if engine parts become hot

THEN engine components will warp and wear out

1. if engine components warp and wear out

THEN car won’t run

1. IF water level is empty || water level is low || engine not cooling

THEN car will heat up

1. IF car heats up

THEN fan will turn on

1. if fan won’t turn on

THEN car will stall **→**

1. IF transmission fluid low || transmission fluid empty

THEN car won’t shift

1. IF car doesn’t shift

THEN car won’t move **→**

1. IF brakepads are worn

THEN brakes are faulty

1. IF brakes are faulty

THEN car won’t stop **→**

1. if brake fluid low

THEN brakes will hit the floor

1. if brakes hit the floor

THEN car won’t stop

1. IF brakes are grinding

THEN brakes are tight

1. IF brakes are tight

THEN brakes will squeal **→**

1. IF tire tread uneven || tire pressure low

THEN steering wheel shakes

1. IF steering wheel shakes

THEN car ride is not smooth **→**

1. IF car veering left/right

THEN alignment problem

1. IF alignment problem

THEN car not driving properly **→**

1. if wipers worn out

THEN wipers won’t properly wipe water off of the windshield

1. if light bulbs are worn out

THEN lights won’t turn on