

## The Sensation of Motor Week in New York, and now in Philadelphia

The new Holmes air-cooled car can be seen at the Philadelphia Show and at the Holmes headquarters, 441 North Broad Street

Designed and built by Arthur Holmes, President of the Holmes Automobile Company, Canton, Ohio, an organization of men with long expert training in air-cooled motor cars. Mr. Holmes was formerly Vice-President and for seven years Chief Engineer of the Franklin Automobile Company. In the Holmes Company he has associated with him some of the most substantial industrial men of the Middle West.

The Holmes car is the last word in a perfected air-cooling system. Seven passenger; full elliptic springs; higher mileage from gasoline and tires; unit power plant; smart design and superior body work.

## ADVANCED ENGINEERING PRINCIPLES EMBODIED IN THE HOLMES CAR

DETACHABLE CYLINDER HEADS. Permit quick access to valves and piston heads, a valuable aid to taking care of the car with the poor grades of gasoline now in the market. This longer life of all parts, and a minimum wear.

VALVE PUSH RODS AND VALVE ROCKER CONSTRUCTION. Compensates at all temperatures for expansion and contraction. The removal of four machine screws and one nut permits the taking off of the entire valve mechanism as a unit.

MULTIPLE DRY-PLATE CLUTCH. Runs equally well either hot or cold. Requires no attention, adjustment, washing out, or oil. Is practically indestructible and noiseless.

UNIT POWER PLANT. Eliminates two universal joints. More compact construction and no back lash between clutch and transmission.

MAGNETO-AUTOMATIC ADVANCE AND RETARD. Not dependent upon battery for ignition, and greater efficiency, particularly in starting and at low speeds.

DOME-HEAD CYLINDER. Gives larger valves, particularly the exhaust valves—more power, the mixture of gasoline and air is distributed in the same quality to all cylinders. The combustion in all the chambers is uniform, giving even distribution of power to all cylinders at any speed-insures a great speed range without gear shifting, and quick pick-up of engine.

patented Holmes Construction leaves the valve springs exposed to the drafts of cooling air, STARTER INSTALLATION. Eccentric arrangement that keeps starter always in perfect alignment. Starter chain may be tightened or loosened by merely revolving starter, and alignment is not affected.

> EEL FRAME. Frame is of steel and is of a very deep section, which gives the maximum strength for its weight. There are only two cross members in the frame proper, one at the rear and one at about the center, giving the necessary flexibility. Frame tapered toward the front, giving shorter turning radius. Low center of gravity obtained by dropping frame just ahead

COOLING. Cylinders cooled by air jacket around all cylinders instead of individually. No waste space between cylinders, engine more compact, shorter crankshaft and camshaft, and vibra-

The Holmes Automobile Company Canton, Ohio