

Kaiser-Darrin's grille looks too small, but is supplemented by airscop below the bumper

■ KAISER-DARRIN DKF-161

2,450 feet per minute. In other words, if you're so minded, you can very safely maintain very high cruising speeds without danger of decreasing the life of the engine.

Drifting along at 30 miles per hour in overdrive, you can pass a slowpoke in a flash by mashing down on the throttle which automatically kicks the gearbox back into conventional third gear; in just five seconds you're making a good 50 miles per hour. Acceleration is good throughout the speed range. In city traffic there's no need to be constantly shifting for normal third (high) gear allows smooth operation down to eight to ten mph.

No slouch on digging out at a green light, the Darrin goes, through the gears, from zero to 60 miles per hour easily in 14 seconds with a competent driver. Of course some may prefer the ease afforded by automatic transmission, so the manufacturer makes this an optional accessory.

The Darrin does get that "What is it?" look, but it should not be considered a snob car; it's a fine compromise between the conventional American car and the imported sports job.



In Jackson, Mich., plant, workmen put the finishing touches on the Fiberglas bodies

SPECIFICATIONS In inches unless otherwise stated

CHASSIS & BODY

Wheelbase	100
Tread	54 front, 54 rear
Length overall	184-1/10
Width overall	67.56
Height (with top up)	51
Ground clearance	5-3/4 (minimum)
Turning circle diameter	35 feet
Steering wheel lock-to-lock	2-3/4 turns
Tire size	5.90 x 15
Weight, shipping	2175 pounds
Overhang	35.09 front, 49 rear
Brake lining area	176.0 square inches
Weight to brake area ratio	12.4 pounds per square inch
Weight to power ratio	24.2 pounds per BHP

ENGINE and contributing equipment

Cylinders, block, valves	6, inline, F-head (overhead inlet, side exhaust)
Bore and Stroke	3.125 x 3.50
Displacement	161 cubic inches
Compression ratio	7.6
Brake horsepower (maximum)	90 @ 4200 RPM
Torque	135 foot pounds @ 1600 RPM
Carburetor	Single, downdraft
Choke	Automatic
Fuel pump	Mechanical, gear-driven, on block
Fuel recommended	Regular
Fuel tank capacity	13 gallons (conservative range 260 miles)
Exhaust system	Straight-through single muffler
Crankcase capacity	5 quarts (add 1 quart for filter)
Drive Shaft type	Exposed
Rear axle type	Hypoid
Rear axle ratio	Manual 4.10; (and available transmissions) Overdrive 4.55:1 Hydraulic 3.54:1 (dual range)
Piston speed @ maximum RPM	2450 feet per minute
Electrical system	6 volts
Cooling system capacity	12 quarts (with heater)

INTERIOR DIMENSIONS In inches

HI Hiproom	50-3/4 (no rear seat)
H Headroom	35-3/4
S Seat Height	9-8/10
L Legroom	46-9/10

PERFORMANCE Based on actual tests on all types of roads

Acceleration (from standing start)	to 30 MPH true speed: 3.5 seconds
	to 45 MPH true speed: 7.2 seconds
	to 60 MPH true speed: 13.8 seconds
Highway acceleration from 50 to 80 MPH	: 11.9 seconds

NOTE: Tests were made with manual (with overdrive) transmission; Hydraulic model is available, but times will be slightly less.

Maximum speed	97 MPH
Weather during tests	sunshine and dry to rain

VISION forward over hood (driver 5' 10")20 ft. 2 in. forward of bumper

There's never been quite such a car, on either side of the Atlantic. The Kaiser-Darrin 181 is the only masterpiece of Howard Darrin, of Paris and Hollywood, famed designer of custom motor cars for the sports car aristocracy of two continents... engineering and built in America by Kaiser-Willys. We believe its superb design of line, its choice of appointments and sensitivity of performance are unequalled in any part of the world, at any price. There's no part so thorough its parts you'll agree it's the outstanding pleasure car of our time.

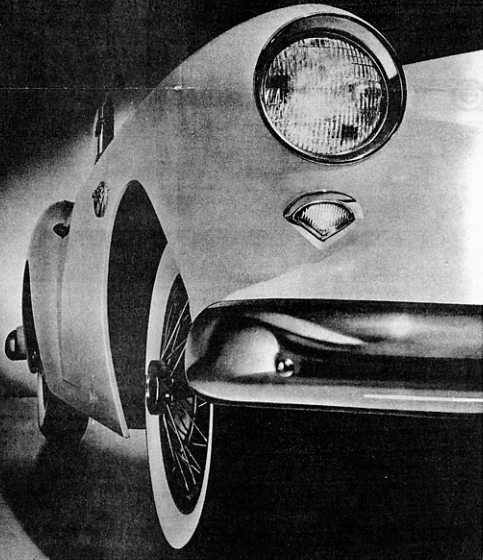
Le successo non è un valore di sport, lo diventa con eleganza.

Jamais on n'a vu pareille voiture, ni d'un côté ni de l'autre de l'Atlantique. Le Kaiser-Darrin 181 est le chef d'œuvre de Howard Darrin, de Paris et de Hollywood, le créateur célèbre de modèles d'automobiles pour l'élite des conducteurs de voitures de sport de deux continents... ingénierie et construit en Amérique par Kaiser-Willys. Nous croyons fermement que la superbe élégance de ses lignes, la sensibilité de son équipement et la subtilité de son fonctionnement à tout prix d'égalité de par le monde entier, à aucun prix, dépassa, en son abstrait que c'est la nature d'ailleurs par excellence de notre époque.

L'ultima novità in termini di sportività...

...è una più alta dell'eleganza. Non c'è mai stata un'automobile simile, né al di qua né al di là dell'Atlantico. La Kaiser-Darrin 181 è il capolavoro di stile di Howard Darrin, di Parigi e Hollywood, il famoso progettatore di automobili fami serie per gli aristocratici dell'automobile di due continenti... progettata e costruita in America da Kaiser-Willys. Siamo convinti che la sua superba eleganza di linee, il lusso dei suoi dettagli, il suo funzionamento perfetto, non sono mai stati raggiunti altrove nel mondo, a nessun prezzo. Non appena avrete provato a guidare la Kaiser-Darrin 181, sarete certo d'accordo con noi: non c'è un'altra vettura da turismo come questa in tutto il mondo!

Kaiser / Darrin *the new name in sports cars... the last word in elegance*



Kaiser*Darrin

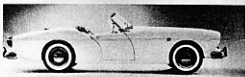
161



3-position top.... A durable nylon top in the distinctive Duessele style allows full visibility front and rear.

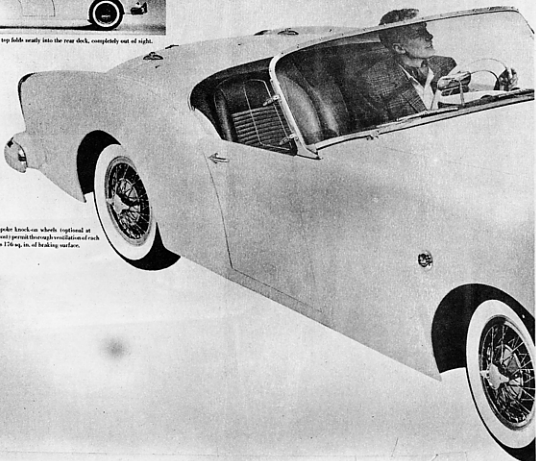


Top can also be latched in the smart ladies style shown. The Plexiglas rear window folds like cloth, yet is strong and durable.

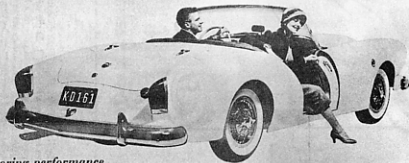


When not in use the entire top folds neatly into the rear deck, completely out of sight.

Wire spoke knock-on wheels (optional at extra cost) permit thorough ventilation of each knob's 170 sq. in. of braking surface.



motoring performance

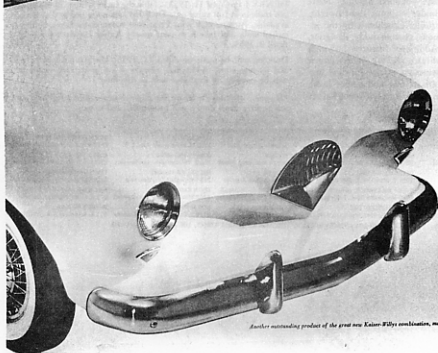


Handcrafted and windproof armored Fiberglas, the Kaiser-Darrin 161 is 124.09 inches long from bumper to bumper and only 56 inches high from road to roof. Even with top up it rises only 50.81 inches above the ground; yet it is so designed that it has a full 7 inches of road clearance.

Its body material is actually stronger than steel by weight, corrosion-proof, safer and more resistant to wear; yet so light that the shipping weight of the Kaiser-Darrin 161 is only 2175 pounds. The lowest center of gravity of any American production car—combined with light, positive center point steering and identical 54-inch front and rear tracks—provides unbelievable stability on turns at competition speeds.

Its six-cylinder engine provides an amazingly low weight-to-horsepower ratio that assures split-second response at all speeds.

Finished in top grain leather, with individual bucket seats and unique sliding doors which disappear into the front fenders, it employs a minimum of chrome to achieve the classic elegance which is the mark of a truly distinguished sports car.



Instrument panel dials, set into polished leather dash, include speedometer, 100 m. p. h. clock, oil, fuel and water temperature gauges.



Individual bucket seats, each nearly 24 inches wide, are upholstered in finest top grain leather.




Uniquely channel one-piece windshield provides continuous stability in all directions.



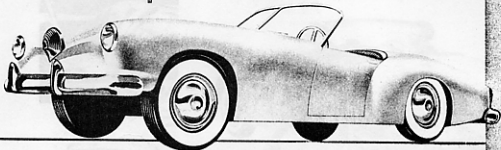
Revolutionary one sliding door provides additional safety and convenience.



Unique rear deck permits easy storage of the Darrin's retractable top when not in use.

Another outstanding product of the great new Kaiser-Willys combination, makers of The beautiful Kaiser  The smart new Willys

EXPERIMENTAL
DKF X-161 COACHCRAFT BY DARRIN OF PARIS



KAISER MANHATTAN



KAISER TRAVELER



HENRY J.

to your nearby Kaiser-Frazer dealer. From these three cars one winner will be drawn to receive a HENRY J. At the winner's option it will be accepted in trade at full retail price on a DKF-161 when they are available. Each dealer will also award an additional prize in his area, to be selected from the same group of cars. Drawing will be made on April 11, 1953.

DKF X-161 EXPERIMENTAL



The most modern car in the world is planned for early production. It will be the DKF-161, with indestructible, moulded fiberglass body; powerful six cylinder engine; light-weight, safe-riding convertible; Coachcraft by the internationally famous custom-body designer, Darrin of Paris. Additional features: 34" high to top of windshield; sliding doors; motor driven top and windows (optional); dual luggage compartments in rear and under hood; European styling and Kaiser-Frazer safety features throughout.

YOU CAN OWN THE FINEST!

The Kaiser-Frazer Dealers of Southern California will give away a HENRY J. on April 11, 1953... that the lucky winner, at his option, can trade in at full value on a DKF-161 when the production cars are available. Anyone may win! Print your name and address on the attached stub, and take it to your nearby Kaiser Dealer before 5 PM April 9, 1953.

Drawing will be made on April 11, 1953. The winner will be notified by telegram.* Additional winners of prizes in each dealer area will be notified by first class mail at this time.

*In event of failure to locate first name drawn within 3 full days, next consecutive name drawn will be notified, and so on.

- | | | | | |
|--|--|---|---|---|
| GRANT W. MUSICK, K.F.
253 N. Los Angeles St., Anaheim | HENRY W. FREEMAN CO.
218 Main St., El Segundo | 1250-70 & Ladbroke, Hollywood | MARQUETTE K.F.
3790 W. Manchester Ave., L.A. | BEACH CITIES MOTOR CO.
234 S. Pac. Ct., Iny, Redondo Beach |
| ARTISIA K.F.
11825 Canyon Blvd., Artesia | 1213 N. Verdugo Rd., Glendale | 1325 American Ave., Long Beach | O'NEILL MOTORS K.F.
302 S. Vermont Ave., Los Angeles | KIRBY BROS. K.F.
1243 San Fernando Rd., San Fernando |
| ASHLEY-LENNERT K.F.
4817 E. Cuyler Ave., East | GLENDALE K.F. INC.
1213 N. Verdugo Rd., Glendale | ABRAH K.F. SALES
228 E. Second St., Los Angeles | NELSON K.F. MOTORS
243 Huntington Dr., Pasadena | TEMPLE CITY MOTORS
8228 Los Tunes Dr., Temple City |
| CAL BAKER K.F.
1023 N. Hollywood Wy., Burbank | K.F. OF HOLLYWOOD, INC.
5250 Hollywood Blvd., Hollywood | BRADYOT & BRYANT AUTO SALES
1284 S. Ladbroke Ave., Los Angeles | IRVING KAHAN K.F.
4702 Vinland Ave. N., Hollywood | MULL'S K.F. SALES AND SERVICE
279 E. Arrow Highway, Upland |
| COMPTON K.F. INC.
1201 E. Compton Blvd., Compton | MACAE MOTORS, INC.
5625 Pacific Blvd., Washington Pk. | JOHNSIE DUCRA AUTO SALES
2113 E. Olympic Blvd., L.A. | SON HOFFET & SON
2124 E. Colorado Blvd., Pasadena | WESTBY MOTORS
511 S. Dowdell Ave., Whittier |

KAISER-FRAZER LOS ANGELES DIVISION, 1101 SOUTH FIGUEROA STREET, LOS ANGELES, CALIFORNIA

AUTOS

Now There Are Four

In South Bend, on a cold grey day with gently descending snow, workers poured from the plant in shock and anger. In Hamilton, Ont., the news was greeted with elation, and men quickly lined up to apply for jobs. Across the U.S., 1,900 dealers sat in their showrooms and forlornly surveyed an uncertain future. In a move long expected but nonetheless shocking when it came, Studebaker Corp. announced that it was dropping auto production in the U.S.—111 years after its founding as a carriage maker and 61 since it turned out its first auto. The company insisted that it will continue to produce autos in its Canadian plant for the U.S. market, but hardly anyone took Studebaker's small future in autos too seriously.

Since the first auto was produced in 1893, some 1,850 U.S. auto firms have gone out of business, two of them (Packard and Kaiser) since World War II. Studebaker's departure from fifth place leaves the U.S. with only four major auto producers. "We were being bled to death," said Studebaker Chairman Randolph Guthrie, a partner in the Wall Street law firm that Richard Nixon recently joined. Guthrie has his own explanation for why Studebaker flopped in one of history's best auto years. "The reason," he says, "is that everyone thought that Studebaker was going out of business."

Unhappy Event. Though anticipated, Studebaker's decision was an unhappy event for many. More than 7,000 men and women will lose their jobs in Studebaker's 6,000,000-sq.-ft. South Bend plant. Part of the engineering and design staffs will move to Hamilton, and only 900 production workers will be kept on in South Bend to produce some



LAST SHIFT LEAVING STUDEBAKER PLANT
Out in the grey cold.

TIME, DECEMBER 20, 1963

of the parts for the Canadian assembly plant. Realizing that Studebaker's future was precarious, the city of South Bend has been diversifying its industrial base for several years to cushion the shock; Studebaker has recently accounted for only 3% of the city's total payroll. Still, that payroll amounted to some \$600,000 a week, and its loss will be intensified by thousands of job-searching workers joining the unemployment rolls.

Studebaker's dealers had no such cushion. With the high-priced Avanti sports car, the medium-priced Hawk and all commercial trucks discontinued, they can still sell the low-priced Studebaker sedans that will be made in Hamilton. But business has been so bad recently that it could hardly get worse after last week's announcement.

Caring for "Orphans." One problem for the dealers is the 22,500 Studebakers in stock. An auto-buying public is understandably reluctant to buy what the trade calls "orphans" (like the discontinued Edsel). Studebaker has attempted to get around this by promising that parts will be available for all its present models. Even so, prices of the remaining autos will almost certainly have to be slashed to attract buyers. Studebaker has tried to escape the anger of its dealers by convincing the Ontario operation and thus technically fulfilling its contract to supply its dealers with autos.

Such considerations aside, Detroit is skeptical about Studebaker's ability to maintain a toehold in the U.S. through its Ontario subsidiary, which is headed by Gordon E. Grundy, president of Studebaker of Canada. Studebaker talks about making 30,000 to 40,000 units annually in Hamilton, but its Canadian market is only about 8,000 cars (the Hamilton plant is now turning out only 48 cars a day), and cars that did not sell well in the U.S. are not likely to improve their sales appeal by crossing the border. Studebaker will continue to be the American sales agent for Mercedes-Benz, which President Byers Burlingame and other top executives drive instead of Studebakers—to the astonishment of Detroit's brand-loyal executives.

Profit Motive. What happened to Studebaker? South Bend was too remote from Detroit to enable the company to move quickly with all the industry's new trends, and Studebaker's ancient plant there was hopelessly inefficient. The company's dealer organization was too small, haphazard and ineffectual. Efforts to revitalize the company were snarled by lack of cash and a series of incredible production snafus. In the past five years, Studebaker has lost at least \$40 million in automaking; this year, despite the introduction of pleasantly restyled 1964 models, sales for the first eleven months fell to 59,742 cars. Last month Studebaker's directors fired President Sherwood Egbert, who insisted on staying in auto production, to clear the way for



BURLINGAME, GRUNDY & GUTHRIE

But by no means out of business.

getting out of the auto business; in his place they put Burlingame, 63, a financial man, with orders to stem the losses.

Studebaker may be largely out of autos, but it is by no means out of business. Under Egbert's direction, Studebaker picked up so many new companies (appliances, chemicals, superchargers) that half of its \$400 million sales this year came from nonautomotive divisions. These divisions earned \$12 million—though the company will end the year heavily in the red because of auto losses and the cost of closing the South Bend plant. Freed from its auto losses and armed with a healthy tax write-off, Studebaker says that it expects to make an overall profit next year.

KAISER INDUSTRIES CORP.
EARNINGS DROP SHARPLY

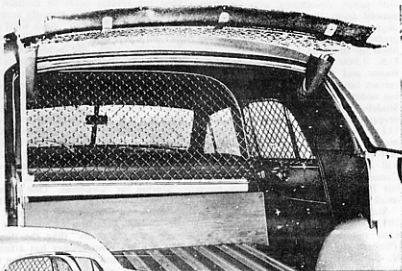
NEW YORK, Nov. 12 (AP)—Kaiser Industries Corp. reported net earnings of \$93,000 in the nine months ended September 30, compared with \$6,815,000 in the same period a year ago.

After providing for dividends on preferred stock, returns for the 1962 period amount to a loss of 5 cents per share of common stock, compared with earnings of 25 cents per share in the same 1962 period.

Profit advances were made by the Kaiser Jeep Corp., a wholly owned subsidiary, and Kaiser Aircraft and Electronics division, but the engineering and construction business lost \$2,800,000, chiefly on one foreign project.

HERE'S ANOTHER "SPECIALIZED"
ITEM FOR TRAVELER AND
VAGABOND OWNERS . . .

"PILFER- PROOF" Kit



**NOTE THESE
PRACTICAL
FEATURES**

Safeguard your Merchandise!

**DON'T WAIT!
TEAR OFF AND
MAIL YOUR CHECK
TO**

1. An ideal protection from thieves breaking and entering into cargo space.
2. Designed to permit driver to make quick deliveries of merchandise without locking the driver compartment.
3. A "natural" for tobacco, candy, coffee, soft drink driver salesmen and salesmen of similar packaged merchandise.
4. An advantage to Demonstrators of machinery and equipment.
5. Excellent for transporting dogs and other animals. Windows of cargo space may be open for ventilation and still protect against pilfering or escape.
6. Panel between driver and cargo space may be readily removed when car is used for passenger transportation.

Each Pilfer-Proof Kit consists of:

- 2—Screens for the doors
- 1—Screen over the rear deck door
- 1—Partition screen between the driving and cargo compartments, with hasp for padlock.

WIRE and IRON PRODUCTS, INC., 840 CHERRY STREET, DETROIT 1, MICHIGAN

Gentlemen:

Please ship _____ Pilfer-Proof Kit(s) @ \$25.00 each Dealer Net, F.O.B. Detroit.

Signed _____

KAISER-FRAZER SALES CORPORATION
WILLOW RUN, MICHIGAN



SERVICE BULLETIN

No. 382

MARCH 6, 1953

TO ALL DISTRIBUTORS AND DEALERS:

REAR AXLE

This bulletin supersedes and cancels Service Bulletin No. 251 Revised, dated December 6, 1950 and No. 335, dated June 2, 1952. It provides current information to assure selection of the proper gear ratio when installing a new rear axle pinion and drive gear set in any Kaiser, Frazer or Henry J vehicle including 1953 models. The information herein may be used to supplement information in the Parts Lists.

REAR AXLE RATIOS

REAR AXLE RATIOS

The proper rear axle ratio must be selected to assure top vehicle performance and economy. Various ratios have been used to suit the terrain and the conditions in the area in which the vehicle is to operate. Therefore, unless operating conditions for the vehicle have changed, a new replacement pinion and drive gear set should be of the same gear ratio as removed from the rear axle.

ALL MODELS

The rear axle ratio is determined by the number of teeth on the rear axle pinion and drive gear which is shown on a metal tag attached to the axle housing cover. For example, 47/11 on the tag indicates 47 teeth on the drive gear and 11 teeth on the pinion. To determine the ratio, divide the larger number of drive gear teeth by the smaller number of pinion teeth (ratio is 4.27:1 in this example). If the tag is missing, the teeth on the drive gear and the pinion can be counted when the axle is disassembled.

NOTE: If the tag is missing, or if the rear axle ratio is changed, a tag should be made and attached to a housing cover bolt to indicate the new axle ratio.

The various rear axle ratios and vehicles in which they have been used are listed in the table on the following page.

REAR AXLE RATIOS

Year	Model	Rear Axle Ratio							
		3.31:1	3.54:1	3.73:1	3.91:1	4.09:1	4.10:1	4.27:1	4.55:1
1947	K-100, K-101, F-47, F-47C			Std		Std			OD
1948	K-481 K-482 F-485 F-486			Std		Std			OD
1949	K-4911			Std	Std	Std			OD
	K-4915				Std	Std			OD OD
	K-4916					Std			OD OD
	K-4919					Std			
	K-4921 K-4922, 4923			Std	Std	Std			OD OD
	K-4925 F-4951, 4961 F-4962								OD OD OD
1950	K-501, 502 K-505, 506			Std	Std	Std			OD OD OD OD
1951	K-511, 512		Hyd		Std	Std			OD
	K-515, 516		Hyd						Std-OD
	K-513								Std-OD
	K-514						Std		OD
1952	K-521, K-522 Virginian		Hyd		Std	Std			OD
	K-521, K-522	Hyd	Hyd		Std	Std			OD
	K-523							Std	Std-OD
	K-524						Std		OD
1953	K-530 Dragon		Hyd						
	K-531, 532		Hyd		Std			Std	OD
	K-533							Std	OD
	K-534						Std		OD

Std - Standard Transmission OD - Overdrive Hyd - Hydra-Matic

DRIVE GEAR AND PINION SETS

The following tables show part numbers of the rear axle drive gear and pinion sets and the differential cases used for the various axle ratios. Each chart contains information on only one particular axle model (axle "model" numbers 41, 44 and 23 are designations assigned by the axle manufacturer).

The ring gear and pinion sets for one model axle cannot be used in a different model axle. However, any of the ring gear and pinion sets listed for each model axle can be interchanged on that model axle if desired. When changing a rear axle ratio, note that the differential case must also be changed for certain ratios.

There are two ring gear and pinion sets listed for a model 41 axle with a 3.91:1 ratio and for a model 44 axle with a 4.55:1 ratio. In both instances, the ring gear and pinion sets with the fewer number of teeth were used in production only until the other sets were available. After your present stock of the 43/11 ratio (on model 41 axles) and the 41/9 ratio (on model 44 axles) has been exhausted, any replacements of these ring gear and pinion sets will be made by using the 51/13 and the 50/11 ratios respectively.

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REAR AXLE

REAR AXLE RATIOS

ALL MODELS

REAR AXLE RING GEAR AND PINION DATA

Model 41 Axle (Oval Shaped Housing Cover)
Used on 1947, 48, 49, 50 and some 1951 Kaisers & Frazers

Axle Ratio	No. of Teeth		Part Number		Gauge Block*
	Ring Gear	Pinion	Ring Gear & Pinion Set	Differential Case	
3.54:1	46	13	209316	209314	B
3.73:1	41	11	202518	200388	B
3.91:1	43	11	204367	200388	B+ .093" #
	51	13	208692	200388	B+ .093" #
4.09:1	45	11	202089	200388	B
4.27:1	47	11	200404	200388	B
4.55:1	50	11	205655	205654	B

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Model 44 Axle (Hex Shaped Housing Cover)
Used on some 1951 and all 1952 and 1953 Kaisers

Axle Ratio	No. of Teeth		Part Number		Gauge Block*
	Ring Gear	Pinion	Ring Gear & Pinion Set	Differential Case	
3.31:1	43	13	213790	209315	E
3.54:1	46	13	209318	209315	E
3.91:1	47	12	212844	212843	E
4.09:1	45	11	212845	212843	E
4.27:1	47	11	212846	212843	E
4.55:1	41	9	212847	212843	E
	50	11	213134	212843	E

REAR AXLE

REAR AXLE RATIOS

ALL MODELS

Model 23 Axle
Used on 1951, 1952 and 1953 Henry J

Axle Ratio	No. of Teeth		Part Number		Gauge Block*
	Ring Gear	Pinion	Ring Gear & Pinion Set	Differential Case	
4.10:1	41	10	209901	209893	D
4.27:1	47	11	213892	209893	D
4.55:1	41	9	209902	209893	D

* Gauge block listed is part of Miller Manufacturing Company W-99 Pinion and Ring Gear Gauge Set and is for use with W-99 set only

Gauge must be set by using .093" shim on top of B face of gauge block for this axle.

SPEEDOMETER GEARS

The following list shows the proper speedometer drive gear and pinion combinations for use with each rear axle ratio. Performance records are dependent on speedometer accuracy, therefore, it is important that the speedometer gears match the rear axle. If the rear axle ratio is changed, it will usually be necessary to change the speedometer pinion. The speedometer gears shown in the table are applicable to all tire sizes, either standard or optional.

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SPEEDOMETER DRIVE GEAR AND PINION DATA

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REAR AXLE

REAR AXLE RATIOS

ALL MODELS

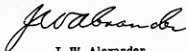
Model	Axle Ratio	Trans. Type	Drive Gear		Pinion		
			Part No.	No. of Teeth	Part No.	No. of Teeth	
1947 & 48 Kaiser & Frazer	3.73:1	Std	202315	5	202314	14	
	3.91:1	Std	202315	5	202314	14	
	4.09:1	Std	200919	5	202000	15	
	4.27:1	Std	200919	5	212360	16	
	4.27:1	OD	200920	5	212360	16	
1949 & 50 Kaiser & Frazer	3.73:1 *	Std	204307	6	204309	16	
	3.91:1 *	Std	204307	6	204310	17	
	4.09:1 *	Std	204307	6	204311	18	
	4.27:1 *	Std	204307	6	204311	18	
	4.55:1	Std	205559	6	205561	20	
	4.27:1 *	OD	204308	6	204311	18	
	4.55:1 #	OD	205560	6	205561	20	
1951 Frazer	3.54:1	K-50 Hyd	209148	7	209288	18	
	3.91:1	K-50 Hyd	209148	7	209336	20	
	4.27:1	OD	207324	6	207984	19	
	4.55:1	OD	207324	6	207328	20	
1951, 52 & 53 Kaiser	3.54:1	K-50 Hyd	209148	7	209288	18	
	3.91:1	K-50 Hyd	209148	7	209336	20	
	3.54:1	K51.2.3 Hyd	**	8	209383	21	
	3.31:1	K51.2.3 Hyd	**	8	209470	19	
	3.91:1	K-51 Hyd	**	8	209384	23	
	3.91:1	Std	207980	6	207983	17	
	4.09:1	Std	207980	6	207982	18	
	4.27:1	Std	207980	6	207984	19	
	4.55:1	Std	207980	6	207328	20	
	4.27:1	OD	207981	6	207984	19	
	4.55:1	OD	207981	6	207328	20	
	1951, 52 & 53 Henry J	4.10:1	Std	209872	5	212360	16
		4.27:1	Std	209872	5	213873	17
4.55:1		Std	209872	5	212361	18	
4.55:1		OD	200920	5	212361	18	

* The pinion and drive gears shown for these axle ratios were used on some late 1948 models. They can be distinguished by the number of teeth.

Also used on some early 1951 Frazers.

**Speedometer drive gear is integral with transmission rear mainshaft.

POLICY: The Kaiser-Frazer Sales Corporation will not participate in the replacement of rear axle gears of different ratios for the sole purpose of effecting operational changes.



J. W. Alexander
General Service Manager



SERVICE BULLETIN

TO ALL DISTRIBUTORS AND DEALERS:

This bulletin is intended to provide advanced information and specifications which will assist servicemen in repairing, maintaining and making the necessary periodic adjustments on the Kaiser-Darrin sports car. More extensive service information and information covering future changes will be provided at a later date in appropriate publications.

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ENGINE

The engine used in the Kaiser-Darrin sports car is a six-cylinder F-Head type with tried and proven features which combine to provide highly efficient yet economical operation.

Engine Data

Type	F-Head
Number of Cylinders	6
Bore	3-1/8"
Stroke	3-1/2"
Piston Displacement	161 cu. in.
Taxable Horsepower	23.44
Max. Brake Horsepower	90 @ 4,200 R.P.M.
Max. Torque	135 ft. lbs. @ 2,000 R.P.M.
Compression Ratio	7.6 to 1
Idling Speed	575 R.P.M.
Ignition Timing	5° B.T.D.C. @ 500 R.P.M.
Firing Order	1-5-3-6-2-4
Compression	115-145 P.S.I. (All cylinders within 10 P.S.I.)

Break In Speeds

After engine warms up do not exceed

40 MPH from 1 to 400 miles.

50 MPH from 400 to 600 miles.

60 MPH from 600 to 1,000 miles.

Do not drive at sustained speeds above 60 MPH until after 2,500 miles.

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MODEL 161
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A complete and systematic tune-up must include adjustment or repairs as necessary to obtain proper compression, ignition and carburetion. Also, clean the crankcase ventilation screen and check to make sure the cooling and exhaust systems are functioning properly.

1. Compression Test - With engine at operating temperature and spark plugs removed, take compression reading at each cylinder while cranking engine with starter. Compression should build up to 115-145 p.s.i. and should be same for all cylinders within 10 p.s.i.
2. Valve Adjustment - With engine cold, clearance between the exhaust valve stems and tappet screws, located in the valve compartment on left side of the block, should be set at .016". The intake valves are operated by overhead rocker arms under the cover on top of the engine. Set clearance between intake valve stems and rocker arms to .018".
3. Spark Plugs - Clean and inspect spark plugs. Regap to .028" to .032", install with new gaskets and torque each plug to 26-30 foot-pounds.
4. Distributor - On a distributor tester check centrifugal and vacuum advance operation. Centrifugal advance starts 2° at 400 engine R.P.M. and maximum advance is 22° at 2700 engine R.P.M. Vacuum advance is 0° at 5 inches of Mercury reaching a maximum of 14° at 14 inches of Mercury.

Clean and inspect cap and rotor for chips, cracks or carbonized paths. Replace burned, pitted or misaligned distributor points. If points are slightly burned or pitted clean with contract point file or stone. Set points at .022" with breaker arm rubbing block on a high point of the cam. Tension on the breaker arm should be 17-21 ounces measured by a spring scale. The proper cam dwell angle is 31° to 37°.

5. Fuel Pump - Check the fuel pump for proper pressure, vacuum and volume. The pressure should be 3-3/4 to 5-1/4 pounds per square inch, vacuum should read at least 10 inches of Mercury when cranking the engine, and the pump should deliver a volume of at least one quart per minute at cranking speed.
6. Timing - Check ignition timing with timing light attached to No. 1 spark plug. Disconnect distributor vacuum advance tube to prevent error and then with engine set to idle at 500 R.P.M., loosen distributor mounting bolt and rotate distributor until timing light flash appears at 5° B.T.D.C. graduation on vibration damper opposite the timing pointer. Reset engine idle speed up to 575 R.P.M.
7. Carburetor - Disassemble, clean and inspect carburetor. Set float level at 9/32". Check metering rod adjustment by backing off the idle speed adjusting screw until the valve will fully close. Press accelerator pump until diaphragm bottoms at the throttle valve closes. In this position, metering rod must bottom in jet and float freely on the pin.
After carburetor is assembled hold choke valve in wide open position, if necessary bend fast idle connector rod until lip of fast idle arm contacts boss on carburetor body. Use a tachometer or vacuum gauge to set the idle mixture screw until highest idle speed or vacuum reading is obtained. Set engine idle speed adjusting screw for 575 R.P.M.
8. After the complete tune-up road test the car.

Lubrication System

The engine pressure lubrication system is designed to provide adequate lubrication at all operating speeds.

In operation oil is drawn from the oil pan, through the floating oil intake, to the pump. From the pump the oil is forced through drilled passages to the crankshaft main and connecting rod bearings, to the camshaft bearings, timing gears and rocker arms. The cylinder walls and piston pins are supplied with oil from spurt holes in the connecting rods. Splashed oil lubricates the tappets. Normal oil pressure should be 30 to 40 pounds at 30 M.P.H. Variations due to changes in speed are normal, however, any rapid fluctuations should be investigated at once.

Crankcase Ventilation

The crankcase is ventilated by air which is taken in through the oil filler tube breather cap, circulated through the crankcase and expelled through a tube mounted on the exhaust valve tappet cover on the left side of the block. The breather cap has an air filter built in which should be washed clean in kerosene and dipped in clean oil every 2,000 miles or oftener under severe conditions.

FUEL

The fuel system consists of the fuel tank, fuel lines, fuel pump, carburetor, air cleaner and accelerator pedal and linkage. Adjust the accelerator pedal linkage whenever operation of the pedal indicates the need.

Fuel Tank and Fuel Lines

The fuel tank has a 13 gallon capacity and is provided with a fuel gauge tank unit which electrically actuates the fuel gauge in the instrument panel. The fuel line is routed along the right frame side rail, across the front of the frame, and back up to the fuel pump. If standard straight tubing is used for replacement, the fuel line being removed should be used as a pattern to form the new line to be installed.

Fuel Pump

A single diaphragm fuel pump is installed as standard equipment. For test specifications see "Tune Up Data" under the "Engine" portion of this bulletin. Repair procedures for the fuel pumps can be found in the "Fuel" section of The Henry J passenger car Shop Manual.

Carburetor

A single throat downdraft carburetor, Carter Model YF-2094S is used on the Kaiser-Darrin. The procedures, not specifications, in the "Fuel" section of the Henry J Shop Manual may be used to repair or adjust this carburetor. Adjust carburetor according to information under "Tune Up Data" in this bulletin. Complete specifications will be furnished at a later date.

Air Cleaner

An oil wetted type air cleaner is provided as standard equipment. The filter element should be removed every 2,000 miles, washed in kerosene dipped in clean oil, drained thoroughly and replaced. An oil bath type air cleaner is available as optional equipment.

EXHAUST

The exhaust system includes the exhaust manifold, front exhaust pipe, rear exhaust pipe, muffler, and tail pipe assembly, and the necessary attaching clamps and mounting parts.

The system is routed from the engine to the outside of the left frame side rail and then toward the rear of the car to the number 3 frame cross member. At this point, the rear exhaust pipe crosses to the inside of the left frame side rail and then follows the side rail to the extreme rear of the frame.

In this system the exhaust manifold does not have a heat control valve. The intake manifold is cast as an integral part of the cylinder head and is completely water jacketed. This construction transfers heat from the cooling system to the intake riser and assists in vaporizing the fuel when the engine is cold, eliminating the necessity of a heat control valve in the exhaust manifold.

The exhaust system normally will give long service without maintenance, however, as a part of engine tune up, all fastenings should be checked for proper tightness and an occasional examination should be made to check for exhaust leaks. For safety purposes any leaks found should be eliminated immediately.

COOLING

A "pressurized" cooling system with a radiator cap relief valve pressure of seven (7) pounds is standard equipment. The cooling system capacity is 11 quarts without heater and 12 quarts if a water circulating heater is installed. Molded hoses 1-1/2" in diameter are used to carry the water from the radiator to the cylinder block.

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pair procedures for this pump appear in the cooling section of the Henry J Shop Manual. Use the 6-cylinder water pump information.

The factory installed thermostat located in the cylinder block water outlet elbow is for use with water and alcohol type antifreeze solution. It starts to open when the coolant temperature reaches 148° - 156° and is fully open at 176° F. A higher temperature thermostat (marked "170") is available for use with water or ethylene glycol (permanent type) antifreeze to improve heater performance, and increases engine efficiency by allowing it to operate at a higher temperature. This thermostat starts to open at 166° - 174° F and is fully open at 194° F.

The Kaiser-Darrin radiator core is of the tube and fin type. To repair the radiator it is taken out through the hood opening after the fan has been removed from the engine, and radiator mounting bolts have been removed.

The water temperature gauge is electrically operated. It consists of an engine unit with a lead to the dash unit or temperature indicator. If either unit is believed inoperative test according to Service Bulletin No. 400.

The system should be inspected periodically for loose connections or deteriorated hose. Always drain the system twice a year and flush thoroughly. Drain cocks open at the lower left side of the radiator and the right side of the cylinder block below the distributor. When refilling add rust inhibitor to water, or if necessary antifreeze containing a rust inhibitor.

For antifreeze requirements add quantity recommended by the manufacturer of the cooling solution used, to protect an 11 quart system (12 with heater) to lowest temperature for which protection is desired.

When attempting to determine the cause of an overheating problem several factors not necessarily originating in the cooling system: such as improper ignition timing, carburetion or dragging brakes might be the source of overheating. Never pour cold fluids into, nor completely drain the engine if it is overheated.

CLUTCH

A single plate, dry-disc type clutch mounted on the flywheel is used. The disc, splined to the transmission drive pinion, includes the clutch facings and is designed to cushion shock, chatter and engine firing impulses through damper springs which surround the disc hub. Three pressure plate levers, when operated by the clutch release mechanism, disengage the clutch. The clutch is actuated through linkage from the clutch pedal to the release fork assembly mounted in the clutch housing.

When checking the clutch and making adjustments, a specified pedal free travel of 1" must be obtained. Adjustment is made by loosening the lock nut from the pivot on the clutch control adjusting rod and turning the rod as necessary. When adjusted to the proper pedal free travel tighten the lock nut against the pivot.

When repairing the pressure plate check the springs with Spring Testing Fixture C-647. At 1-9/16" the correct spring load is 220 - 230 lbs. Adjust the pressure plate levers according to the information in the Henry J Shop Manual which applies to the three spring clutch.

TRANSMISSION AND OVERDRIVE

The Kaiser-Darrin has a conventional transmission as standard equipment. Overdrive is available as optional equipment.

All repairs, lubrication and specification information in the "Transmission and Overdrive" section of the Henry J Shop Manual applies to the Kaiser-Darrin transmission, and overdrive when so equipped except there is no provision for the use of a tool such as KF-69 for the linkage adjustment procedure. Therefore, it will be necessary to feel for proper positioning of the internal levers in the lower lever housing by manipulation of the gear shift lever before tightening the adjusting nuts against the pivots of the external levers on the lower lever housing.

PROPELLER SHAFT AND UNIVERSAL JOINTS

Two "cross and yoke" type universal joints are used on the propeller shaft with a slip joint at the transmission end to compensate for longitudinal movement. There are three grease fittings on the shaft which require periodic lubrication as specified under the lubrication heading in this bulletin. No other maintenance or adjustment is necessary, except an occasional check for wear, or the presence of mud, tar, dents, etc. which can cause unbalance, and resulting vibration.

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No wear adjustments are provided; therefore, worn parts must be replaced in accordance with the service procedures in the 1951 Kaiser-Frazer Shop Manual which refer to the "cross and yoke" type universal joint propeller shaft.

CHASSIS SUSPENSION

The front suspension is an independent parallel arm type, using a single coil spring with a shock absorber inside for support at each wheel. In the rear suspension two semi-elliptic, leaf-type rear springs are hung longitudinally from the frame side rails in rubber bushed mountings. The rear axle is attached to each spring with U-bolts and a spring plate.

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Chassis suspension service procedures appearing in the Henry J Shop Manual apply to the sport car. The front end alignment specifications in the Shop Manual apply; however, they may also be found in the "Specifications" section of this bulletin.

REAR AXLE

The rear axle assembly is the semi-floating type with hypoid gears. Major components such as the pinion, differential and axle shafts are mounted on tapered roller bearings to provide long, trouble-free operation. The pinion is adjustable endwise to provide proper position of the pinion relative to the differential drive gear, by the use of shims between the rear bearing cup and axle housing. Shims are used between the bearings and differential case at each side of the differential for alignment of the drive gear to the drive pinion and to obtain proper gear backlash.

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A 4.10:1 rear axle ratio is factory installed equipment with the standard transmission. With the overdrive transmission, which is optional equipment, a 4.55:1 rear axle ratio is provided.

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For complete rear axle service information, refer to the Henry J Shop Manual and Service Bulletin numbers 382 and 385.

STEERING

For information regarding steering system repairs refer to the Henry J Shop Manual. Due to the position of the steering shaft in the sports car, it has been necessary to change some of the parts and the method of mounting these parts to the car or their related parts. However, repair procedures, maintenance information and adjustment specifications in the Henry J Shop Manual do apply to the sports car.

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BRAKES

With the exception of minor changes in the brake backing plate and routing of the brake tubing and hand brake cables the brake system is the same as installed on Kaiser Models.

For information regarding brake repair and maintenance refer to the brake section of the 1951 Kaiser-Frazer Shop Manual.

MODEL

WHEELS AND TIRES

Wheels

The wheels are 15" disc type with integral drop center rims. They are each bolted, by means of five wheel bolts to a wheel hub, together with the brake drum. The front hubs are mounted on the steering knuckles and are installed on two opposed tapered roller bearings which are adjustable. Rear hubs are keyed directly onto the ends of the rear axle shafts and the axle shafts are supported in tapered roller bearings. The front and rear wheel tread is 54 inches.

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Both the front and rear wheel bearings should be checked for proper lubrication during the predelivery inspection and lubricated every 10,000 miles with wheel bearing grease. When lubricating rear axle wheel bearings, 1/2 ounce of grease should be applied to each rear wheel bearing using a low pressure hand gun.

The lubrication period also provides a good opportunity to check periodically for proper front wheel bearing adjustment. Adjust the front wheel bearing by the method outlined on Page 219 of the 1953 Kaiser-Frazer Shop Manual.

Tires

For safe operation and riding comfort in proportion to car size 5.90 x 15 tires are used. The recommended tire pressure is 24 pounds, front and rear when the tires are cold. Tire pressure should be checked at least once a week, and tires rotated every 5,000 miles as indicated by figure 315 appearing on page 218 of the 1951 Kaiser-Frazer Shop Manual.

The information on wheel balancing and tire maintenance in the 1951 Shop Manual is also applicable to the wheels and tires installed on the Kaiser-Darrin sport car.

BODY

The body on the Kaiser-Darrin sports car is made of light weight fiberglass-reinforced plastic. The body shell, which is made in a mould rather than from stampings, as is the case with a steel body, weighs only 300 pounds or a fraction of the weight of an equivalent steel body. The plastic material of which the body is made has superior resistance to weather, corrosion, impact, rot, and is stable under extreme temperature changes.

The finish used on standard production models is the same high quality lacquer that has always been used on the Kaiser Dragon "Hardtop" models. When refinishing or paint repair is necessary, the time proven methods and materials which apply to steel body lacquer repair should be used.

Complete information regarding major repair to the plastic body will be provided in an appropriate publication at a later date. If necessary to make minor repairs such as filling a hole, or a deep scratch in the body, proceed as follows: (NOTE: Plastic body repairs must be done at room temperature (77° or over) with no moisture in air.)

1. If the hole is large enough to require a backing for the liquid plastic filler being used, place a piece of fiberglass mat or cloth over the hole on the underside of the body.
2. Fill the hole with the liquid plastic filler so that the material extends above the original body contour in the area of the hole.
3. Allow liquid plastic to thoroughly dry and harden. Where area is thin, a heat lamp may be used to accelerate cure.
4. Sand down and refinish the same as you would in the case of a leaded fill in a steel body.

Sheets of fiberglass cloth or fiberglass mats are available from most any automobile body repair supply house. Kish Epoxy Resin 316 and Kish Epoxy Catalyst 40A can be mixed and used as the liquid plastic filler. Add three (3) parts of catalyst 40A to ten (10) parts of resin 316.

The Kish Epoxy Resin and Catalyst can be ordered from Kish Resins, Inc., Lansing, Michigan.

NOTE: Shelf life is approximately 12 months. It will be longer if kept at 40° - 50° F.

ELECTRICAL

Do not install electrical units that are not duplicates of those with which the vehicle is factory-equipped. Mis-mated or unapproved electrical units cannot be expected to provide long lasting satisfactory performance.

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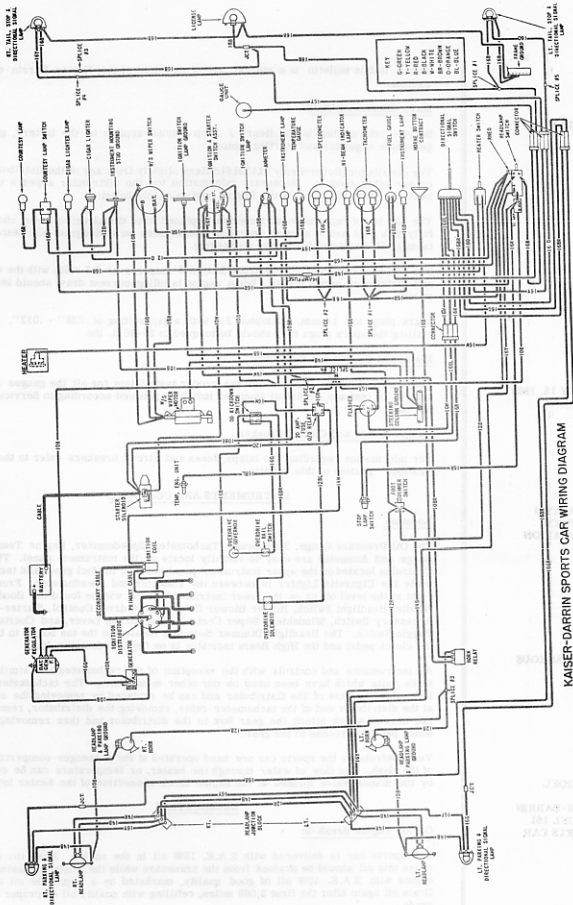


Fig. 1 in this bulletin is a general wiring diagram of the Kaiser-Darrin electrical system.

Major Electrical Units

Service information in the Henry J Shop Manual applies to the battery, generator, generator regulator and starting motor.

The distributor (Delco-Remy 1112316) differs slightly from any of the distributors used on our other models. Necessary information for the distributor appears under the heading "Tune Up Data" in the Engine portion of this bulletin.

The coil is not repairable and should be replaced when defective; however, check carefully both cold and at normal operating temperature on an adequate coil tester to determine if it is defective before discarding.

The coil has a current consumption (hot) of 5 amperes at 6.3 volts with the engine off and distributor points closed. When engine is idling current draw should be 1.3 amperes.

Spark plugs are 14 mm. Champion J-8 with a gap setting of .028" - .032". When installing the spark plugs they should be torqued to 26-30 ft. lbs.

Electrical Gauges and Indicators

The wiring diagram Fig. 1 shows the proper installation for all the gauges and indicators. To test any electrical gauge or indicator proceed according to Service Bulletin No. 400.

Lamps, Fuses and Circuit Breaker

For information regarding the lamps, fuses and circuit breakers refer to the "Specifications" portion of this bulletin.

INSTRUMENTS AND CONTROLS

Location

The Oil Pressure Gauge, Fuel Gauge, Tachometer, Speedometer, Engine Temperature Gauge and Ammeter are easy to visually locate on the instrument panel. The Choke Control is located on the upper instrument panel between the fuel gauge and tachometer, while the Cigarette Lighter is between the ammeter and speedometer. From left to right at the level of, or on the lower instrument panel, will be found the Hood Release Handle, Headlight Switch, Heater Blower Control, Overdrive Control, Starter-Ignition-Accessory Switch, Windshield Wiper Control, Hand Brake Lever, and Courtesy Light Toggle Switch. The Headlight Dimmer Switch is located on the toe board to the left of the clutch pedal and the High Beam indicator is on the speedometer dial.

All instruments and controls with the exception of the tachometer are similar to the same units which have been used on our other model cars. The tachometer gear is located in the base of the distributor and can be replaced by removing the screw cap at the distributor end of the tachometer cable, removing the distributor, removing the two screws which attach the gear box to the distributor and then removing the box which provides access to the gear.

Vent controls on the sports car are hand operated at the passenger compartment side of the dash. The flow of water through the heater, or temperature can be controlled by the manual valve located at the engine block connection of the heater inlet hose.

LUBRICATION

Oil for Engine Break-In

The sports car is delivered with S.A.E. 10W oil in the engine. After the first 500 miles this oil should be drained from the crankcase while the engine is warm. Refill engine with S.A.E. 10W oil of good quality, marketed by a reputable oil company. Drain oil again after the first 2,000 miles, refilling with quality oil of proper seasonal grade.

Use of special "break-in" additives in the engine oil or gasoline is not required. However, "Miracle Power" is an accepted product for such use. For further detailed information see the lubrication chart on Page 9.

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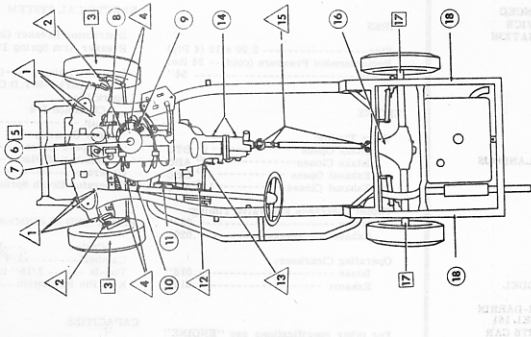
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LUBRICATION



KEY TO SYMBOLS
 ○ 2,000 Miles
 □ 10,000 Miles
 △ 1,000 Miles

CHART

- ▲ 1 SUSPENSION BUSHINGS
3 fillings on upper arm, 3 fillings on lower arm. Apply Chassis Lubricant with pressure gun.
- ▲ 2 STEERING KNUCKLE
2 fillings. Apply Chassis Lubricant with pressure gun.
- ▲ 3 FRONT WHEEL BEARINGS
Remove, clean, repack with Wheel Bearing Grease. 25 oz. per wheel. Do not fill hub.
- ▲ 4 TIE ROD JOINTS
Remove, clean, repack with Wheel Bearing Grease. Apply Chassis Lubricant with pressure gun.
- ▲ 5 OIL FILTER
Replace element. Add 1 qt. Engine Oil to crankcase capacity when element is replaced.
- ▲ 6 AIR CLEANER
Remove, clean, and wet with Engine Oil.
- ▲ 7 FAN BELT
TIGHTEN FILLER TUBE AND BREATHER CAP
Drain crankcase and refill with 5 qts. Engine Oil (6 qts. if filter element is changed). Wash breather cap and wet with Engine Oil.
- ▲ 8 GENERATOR
Fill each oil cup once with Engine Oil.
- ▲ 9 DISTRIBUTOR
4 points: 4-5 drops Engine Oil on cam shaft wick, 3-4 drops in shaft bushing oil caps, 1 drop on breaker lever pivot. Wipe cam lightly with Wheel Bearing Grease.
- ▲ 10 STEERING GEAR
Check, refill with Steering Gear Lubricant up to filler hole. Capacity - 36 ounces. Brake grease.
- ▲ 11 BRAKE PEDAL
Check, refill with Hydraulic Brake Fluid to 1/2" below filler hole.
- ▲ 12 CLUTCH PEDAL
1 filling. Apply Chassis Lubricant with pressure gun.
- ▲ 13 TRANSMISSION AND OVERDRIVE
Check both units, refill with Transmission Gear Lubricant up to filler hole. Capacity: Transmission-15 pints, Overdrive-3/4 gallon.
- ▲ 14 REAR AXLE
Check, refill with Hypoid Gear Lubricant up to filler hole. Capacity: 25 pounds.
- ▲ 15 REAR WHEEL BEARING
Remove, clean, repack with Wheel Bearing Grease to each wheel with low pressure gun. (Keep vent in housing open.)
- ▲ 16 REAR SPRINGS
Spray or paint springs with Engine Oil.

Lubricant Recommendations

ENGINE OIL

Engine - Above 32°F. use S.A.E. 20 or 20W
 + 32°F. to + 100°F. use S.A.E. 20W
 + S.A.E. 100 - 100°F. use S.A.E. 100
 SW
 Select oil for lowest expected temperatures.

Below + 32°F. use TRANSMISSION GEAR LUBRICANT
 Use S.A.E. No. except when high temperatures prevail, then use S.A.E. 90

HYPOID GEAR LUBRICANT
 Use S.A.E. 90 except when extremely low temperatures prevail, then use S.A.E. 80

CHASSIS LUBRICANT
 Use MCL No. 1. Below + 23° use No. 0

WHEEL BEARING GREASE
 Use MCL No. 2

STEERING GEAR LUBRICANT
 If Multi-Purpose, use S.A.E. 90

SPECIFICATIONS

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SPECIFICATIONS

Car Serial Number—On engine compartment side of dash.

Engine Serial Number—Stamped on right side of cylinder block above generator.

GENERAL

Wheelbase----- 100"
 Minimum Road Clearance ----- 5-3/4"
 Overall Length----- 184"
 Overall Width----- 68-1/4"
 Overall Height (top up)----- 51"
 Overall Height (top down) ----- 49-3/4"
 Shipping Weight (approx.) ----- 2175 lbs.
 Turning Diameter ----- 35 ft.
 Brake Drum Diameter ----- 11"
 Effective Brake Area ----- 176 sq. in.
 Brake Shoe Clearance
 Adjustment----- .010"

Rear Axle Ratios:
 Conventional Trans.----- 4.10 to 1
 Overdrive Trans. ----- 4.55 to 1

Transmission Ratios:
 First----- 2.605 to 1
 Second ----- 1.630 to 1
 Third ----- 1.000 to 1
 Reverse ----- 3.536 to 1
 Steering Ratio (Overall) ----- 15.6 to 1

TIRES

Size ----- 5.90 x 15 (4 Ply)
 Recommended Pressure (cold) -- 24 lbs.
 Tread ----- 54"

ENGINE

Valve Timing:
 Intake Opens ----- 9° BTC
 Intake Closes ----- 50° ABC
 Exhaust Opens ----- 47° BBC
 Exhaust Closes ----- 12° ATC

Tappet Clearance For Valve Timing:
 Intake ----- .027"
 Exhaust ----- .020"

Operating Clearance:
 Intake ----- .018"
 Exhaust ----- .016"

For other specifications see "ENGINE" portion of bulletin.

FUEL SYSTEM

Tank Capacity----- 13 gal.
 Fuel Pump Pressure----- 1-1/4 lb. max.
 @ 500 R.P.M.
 Carburetor Float Level----- 9/32"
 between float and air horn,
 air horn inverted.
 Fuel Pump Type ---- Single Diaphragm,
 Camshaft Driven.
 Carburetor Type----- Downdraft, Single
 (Carter YF 2094S)

LUBRICATION SYSTEM

Type----- Pressure
 Normal oil pressure----- 30 to 40 lbs.
 @ 30 MPH
 Crankcase capacity----- (less Filter)
 5 quarts
 Oil Pump type ----- Gear
 Oil Intake type ----- Floating

COOLING SYSTEM

Capacity without Heater----- 11 qts.
 Capacity with Heater----- 12 qts.
 Radiator cap pressure----- 7 lbs.
 Thermostat Starts to Open ----- 148°
 to 156° F.

ELECTRICAL SYSTEM

Distributor Breaker Gap ----- .022"
 Breaker Arm Spring Tension ----- 17 to 21 oz.
 Ignition Timing ----- (Mark on vibration damper) -- B.T.D.C. 5° @ 500 R.P.M.
 Spark Plug:
 Champion J-8
 Gap ----- .028" to .032"
 Battery Capacity:
 Ampere Hours ----- 100
 Number of Plates ----- 15
 Generator ----- (Delco-Shunt)
 Generator Brush Spring Tension -- 28 oz.

FRONT END ALIGNMENT

Caster ----- +1° to -1°, 0° Pref.
 Camber----- +1/4° to 1°, +1/2° Pref.
 Toe-In ----- 3/16" to 1/4", 1/4" Pref.
 King Pin Inclination ----- -4° to 4-3/4°
 4-1/2° Pref.

CAPACITIES

Cooling System (with Heater) --- 12 qts.
 Fuel Tank ----- 13 gal.
 Rear Axle ----- 2-1/2 pts.
 Conventional Trans. ----- 1-1/2 pts.
 With Overdrive ----- Add: 3/4 pt.
 Crankcase (less filter) ----- 5 qts.

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<u>Location or Use</u>	<u>LAMP CHART Watts or Candlepower</u>	<u>Trade Number</u>
Headlight	45-35 Watts	4030
Parking, License Plate	3 CP	63
Tail, Stop, Direction Signal	21-3 CP	1154
Instrument Panel	2 CP	55
High Beam Indicator, Turn Signal Pilot, Ignition Key Light, Cigar Lighter Lamp	1 CP	51
Courtesy Light	6 CP	81

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CIRCUIT BREAKER-30 Amps at Light Switch

FUSE-20 Amps at Overdrive Relay

FUSE-10 Amps at Heater

NO. 416

JANUARY 15, 1965

ADVANCED
SERVICE
INFORMATION

J. W. Alexander
J. W. Alexander
General Service Manager

NOTE: This bulletin does not change any existing franchise rights or create any new franchise rights.

MISCELLANEOUS

MODEL

KAISER-DARRIN
MODEL 161
SPORTS CAR

WILLYS MOTORS, INC.

KAISER-WILLYS SALES DIVISION
TOLEDO, OHIO



Service Bulletin

TO ALL DISTRIBUTORS AND DEALERS:

This bulletin supersedes and cancels all "Headlamp Aiming" instructions in the present Kaiser-Willys Shop Manuals, Owner Manuals and any information or instructions contrary to the following.

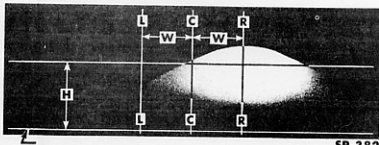
The standard procedure for headlamp aiming and adjusting is hereby corrected with a 2" aim specification below the horizontal line instead of the usual 3" and 4½" aim below the horizontal line as specified in the shop manuals.

The procedure is as follows if no test equipment is available.

1. Park vehicle on a smooth level floor or pavement 25 feet from a vertical surface, such as a door or wall, preferably of light color. Have the center line of the car at right angles to the vertical surface. The vehicle should not be occupied or loaded and tires should be inflated to recommended pressure.

2. Using the illustration as a guide proceed as follows:

Measure the height of the centers of the headlights from the floor. On the vertical surface or wall draw a horizontal line located by measuring a height from the floor (See H) which is 2" less from the height of the headlight centers. Mark a point on this line in line with the axis or center line of the car and draw a vertical line (CC) through the point. Measuring to the right and left of the vertical line (CC) a distance (W) equal to half of the horizontal distance between the head light centers and draw two vertical lines (LL and RR). Remove the retaining screws and the lamp doors, turn the headlights on to the driving or upper beam. Cover the left headlight and aim the right one by turning the upper adjusting screw to tilt the beam up or down, and the side screw to swing the beam right or left. Adjust to obtain the relation between the light beam pattern and the right vertical line (RR) on the wall as shown in the diagram in this bulletin. Cover the right headlight and repeat the procedure above on the (LL) left vertical line. Install the headlight doors and retaining screws.



SP-382

NOTE: This bulletin does not change any existing franchise rights or create any new franchise rights.

K-W NO. 273

December 9, 1954

ELECTRICAL

HEADLIGHT AIMIN

MODELS:
ALL KAISER
AND WILLYS
VEHICLES

WILLYS MOTORS, INC.

KAISER-WILLYS SALES DIVISION
TOLEDO, OHIO



Service Bulletin

TO ALL DISTRIBUTORS AND DEALERS:

This bulletin supersedes the information regarding plastic body repairs included in Service Bulletin K-W 176. A notation making reference to this bulletin should be placed on page 6 of K-W 176 under the heading "Body".

Knowledge of satisfactory plastic body repair methods for the Kaiser-Darrin has reached the point where the average body repairman, with the use of tools and materials readily available, can rebuild or repair plastic bodies with confidence that satisfactory results can be obtained both structurally and from an appearance standpoint.

All types of body repairs encountered on the Kaiser-Darrin will be simple to complete if the specific materials recommended are used in strict compliance with the detailed procedures in this bulletin.

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K-W No. 258

September 15, 1954

BODY

PLASTIC BODY
REPAIR

MATERIALS

The materials listed have been selected because, in addition to providing a durable repair, tests and usage has proven them to be the safest to mix and handle.

1. KISH EPOXY RESIN #316
Source - Kish Resins, Inc., Lansing, Michigan.
2. KISH EPOXY CATALYST #40 A
Source - Kish Resins, Inc., Lansing, Michigan.
3. FIBERGLASS CLOTH OR MAT
Source - Automobile Body Repair or Marine Repair Supply House.
4. FILLER
 - a. Magnesium Silicage
 - b. Calcium Carbonate
 - c. Santocil (Mon-Santo)Source - Drug Store or Chemical Supply House.
5. CELLOPHANE
Source - Office Supply, Grocery, etc., Retail Stores.

MODEL

KAISER-DARRIN
MODEL 161
SPORTS CAR

MATERIAL CHARACTERISTICS

If satisfactory repairs are to be assured, it is necessary that the following information on Material Characteristics be read and thoroughly understood before any repairs are attempted.

Plastic - The Kish Epoxy Resin #316 is a Pre-Polymer type resin, chemically compounded to create its own heat for hardening. It is provided in a liquid state and by the accurately measured introduction of Kish Epoxy Catalyst #40A, a chemical reaction is produced which hardens the combined materials into a clear plastic to be used in combination with fiber-glass.

The resulting plastic should never be used by itself to repair an area more than one (1) inch in diameter if the area has a depth greater than 1/16". Larger areas of unreinforced (clear) plastic are known as "Resin Rich" areas and are easily cracked, chipped or broken.

The clear plastic will not adhere to a vertical surface and cannot be easily moulded to necessary shapes or contours.

Dampness or wet weather have a tendency to retard the plastic hardening process. High temperatures will cause the Resin and Catalyst mixture to harden before adequate time is given for application to the repair.

In view of the above, plastic body repairs should be accomplished in an area of low humidity at room temperature (approximately 70° F) if possible.

A heat bulb or lamp placed 18" to 20" away from the repaired surface will be necessary if repairs are being made under high humidity conditions. The heat may be applied if desired, to hasten hardening under normal humidity conditions.

If working under high temperature conditions above 90° keep the Resin and Catalyst refrigerated at 40° to 70° F until just before they are mixed for use. This will prevent the mixture from hardening before sufficient time is allowed for application.

Shelf life of Kish products is approximately 12 months. It will be extended if kept between 40° and 50° F.

Fiberglass - Fiberglass is the reinforcing "solid" combined or saturated with the plastic to give repairs strength and durability. It is available in the form of cloth, mats or strands.

Filler - Fillers are mixed with the clear plastic for the sole purpose of thickening the plastics to a putty like consistency for easy application to small areas on vertical surfaces and to make any necessary surface shaping or moulding operations easy for any type of repair. Fillers do not reinforce the plastic. Large areas repaired with a plastic and filler mixture, without fiberglass reinforcing, would be "Resin Rich" and would not have adequate strength or durability.

MIXING OF PLASTIC RESIN AND CATALYST

Always mix by weight three (3) parts of Resin to one (1) part of Catalyst as follows:

1. Use "Postal Scale" or equivalent.
2. Set six (6) ounce size paper cup on scale and adjust scale to zero.
3. Pour 3 ounces Resin #316 into cup.
4. Pour 1 ounce Catalyst 40A into cup.
5. Stir vigorously with a clean wooden stick, (Physician's Tongue Depressors are ideal) until the material is thoroughly mixed.
6. If filler is desired, it is added at this point, in small quantities at a time, until the desired consistency is obtained. Stir vigorously all the time the filler is being added. Do not use more than one kind of filler in the same mixture.

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September 15, 1954

BODY

PLASTIC BODY
REPAIR

MODEL

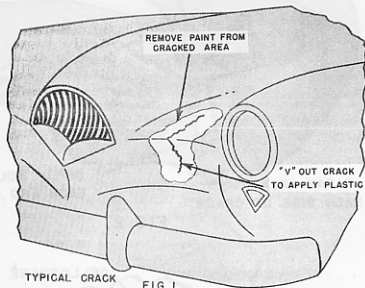
KAISER-DARRIN
MODEL 181
SPORTS CAR

NOTE: Mixing small quantities as indicated above is recommended, as the mixture will harden enough to become useless if not applied in approximately fifteen minutes from the time the Catalyst is added to the Resin.

COLLISION DAMAGE

The fiberglass body will suffer damage only at the area of impact. Several cracks may appear, or the complete breaking out of a section of a plastic panel may occur.

REPAIR OF CRACKED AREA



K-W No. 258

September 15, 1954

BODY

1. Sand or remove paint around the crack to expose a liberal surface of plastic (2" to 3") on either side and at each end of the crack.
2. Cut a "V" the length of the crack, with a 1/4" drill motor and small rotary file. The cut should be deep enough to provide ample space for repair material and remove all traces of the crack. Method of cutting "V" is similar to grinding a cracked area in metal prior to welding.
3. Drill a small hole on each end of crack line to prevent extension of crack beyond repaired area at later date (See Figure 2).
4. Should a break or crack through the thickness of the body be encountered, clean all foreign material (undercoating, mud, etc.) from underside of the damaged area with a disc sander, rough sandpaper, etc. 2" to 3" all around the crack or break. (See Figure 2).
5. Cut two or three sheets of fiberglass cloth or mat, as desired for strength, to the size required for application to underside of the damaged area.
6. Mix clear plastic of Resin and Catalyst according to mixing instructions on page 2.
7. Saturate fiberglass cut pieces with plastic mixture, by using a small brush, and apply to the damaged area. If support is required to hold the saturated fiberglass in place, cover with a piece of cellophane, then employ a wood or metal prop (See Figure 3). Cellophane is the only material that can be used to keep the wood or metal prop from sticking to the repair.
8. Examine the depth of the prepared "V" from the exterior side of the repair. If deeper than 1/16", fill to within 1/16" of the final surface contour with fiberglass strips or pieces saturated with the clear plastic mixture. Be sure repair material is forced into the "V" so no air bubbles or holes remain.
9. Mix fresh quantity of plastic and add filler according to mixing instructions until desired putty-like consistency is obtained.

PLASTIC BODY
REPAIR

MODEL

KAISER-DARRIN
MODEL 161
SPORTS CAR

BODY

PLASTIC BODY
REPAIR

MODEL

KAISER-DARRIN
MODEL 161
SPORTS CAR

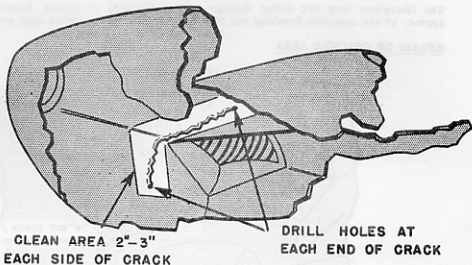


FIG. 2

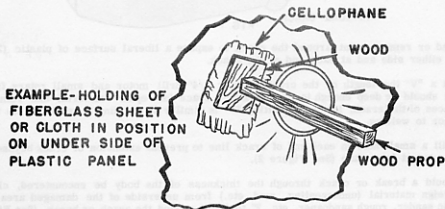


FIG. 3

10. Fill the remaining 1/16" depth of the repair with the plastic and filler mixture, making sure to build repaired area to a point above the original surface contour. Apply with a wooden paddle (Tongue Depressor) as solder is applied to a welded area or dent on a metal body. Be sure no air bubbles, holes or pits remain.
11. Allow the plastic to cure at least one hour before continuing the repair or longer if working under damp conditions. (See "MATERIAL CHARACTERISTICS").
12. Work patched area to the final desired contour and surface as you would a soldered area on a metal body repair. Use "Vexen" body file, dry paint sander, "litter-bug" with 120 sandpaper or equivalent tools.
13. Paint the repaired area. See "REFINISHING PLASTIC REPAIRS" on page 8.

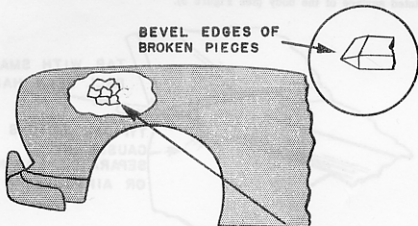
REPAIR OF HOLE IN BODY

Page 5

1. When Pieces are Recovered.

- Sand or remove paint to expose a liberal surface of clean plastic (2" to 3") around the hole.
- Thoroughly clean 2" to 3" all around hole on underside of the damaged area as indicated in Figure 2.
- Remove all paint from broken pieces.
- Bevel edges of the hole and all broken pieces as indicated in the insert of Figure 4.

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September 15, 1964

FIG. 4
APPLY PLASTIC MIXTURE TO ALL EDGES
INSERT PIECES LIKE A JIG-SAW PUZZLE

BODY

- Mix a quantity of plastic and add filler according to previous instructions until a mixture of very thick consistency is obtained.
- Fit pieces back into hole as you would put a jig saw puzzle together. Use the thick plastic and filler mixture to hold the pieces in place (See Figure 4). Be sure pieces replaced are not flush with outer surface of the body panel. Adequate space for a final layer of plastic and filler 1/16" thick must be provided for.
- Cut fiberglass to size required for application to underside of damaged area.
- Mix clear plastic according to previous instructions.
- Saturate fiberglass with clear plastic and apply to underside of damaged area.
- Support patch as shown in Figure 3 if necessary.
- To complete the repair, follow operations 9, 10, 11, 12 and 13 under the heading "REPAIR OF CRACKED AREA".

PLASTIC BODY REPAIR

3. When Pieces Are Not Recovered.

- Follow operations a, b, g, h, i, and j under heading "When Pieces Are Recovered".
- Cut piece of fiberglass to size of the hole, saturate with clear plastic and place in the hole flat against the fiberglass covering the underside of the repair.
- Work any trapped air out from between the layers of fiberglass.

MODEL

KAISER-DARRIN
MODEL 161
SPORTS CAR

- d. Repeat operations b and c above until the hole has been filled to within 1/16" of the top.
- e. Finish repair by following operations 9, 10, 11, 12, and 13 under the heading "REPAIR OF CRACKED AREA".

LAMINATION SEPARATIONS OR AIR POCKETS

This type of defect is recognized by a series of small cracks grouped close together on the painted surface of the body (See Figure 5).

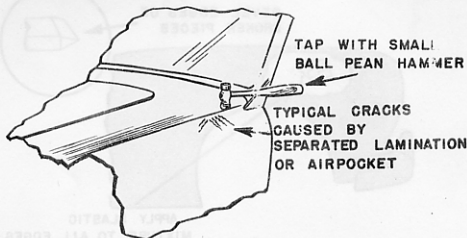


FIG. 5

This type of defect is caused by trapped air or an insufficient saturation of the fiberglass with clear plastic material and may be repaired as follows:

1. Tap area with small hammer to determine size of the affected area. A dull hollow wall sound indicates lamination separation or air pocket. Many times the faulty area is larger in size than indicated by visible cracks.
2. Remove paint from suspected area.
3. Use each crack line as a guide and remove material with rotary file until area is free of any defect. In some cases it may be necessary to cut a section out of the body area involved.
4. Complete repair by one of the following three methods whichever applies.
 - a. If depth of the area prepared for repair is less than 1/16" deep, follow operations 9, 10, 11, 12, and 13 under the heading "REPAIR OF CRACKED AREA".
 - b. If depth of the prepared area is greater than 1/16" deep (but not through the body panel) build up to within 1/16" of the final surface contour with fiberglass strips or pieces saturated with the clear plastic mixture. Then follow operations 9, 10, 11, 12, and 13 under the heading "REPAIR OF CRACKED AREA".
 - c. Should the prepared area penetrate through the body panel, or if it has been necessary to cut a section out of the body, follow repair operations in part 2 "When Pieces Are Not Recovered", under "REPAIR OF HOLE IN BODY".

"RESIN RICH" OR BRITTLE AREAS

A "Resin Rich" or brittle area has been previously identified as too large a mass of clear plastic containing no fiberglass to provide the necessary strength.

This condition is usually found on the edge of openings, flanges or at the apex of contour angles.

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September 15, 1954

BODY

PLASTIC BODY REPAIR

MODEL

KAISER-DARRIN MODEL 161 SPORTS CAR

The condition is suggested by a crack in the surface of the body, or a chipped out area. It is easily identified once the paint has been removed from the suspected area, as the plastic will be transparent and no fiberglass will be evident.

Repair "Resin Rich" areas as follows:

1. Cut away clear plastic with rotary file until areas with fiberglass are reached, (See Figures 6, 7, 8, and 9)

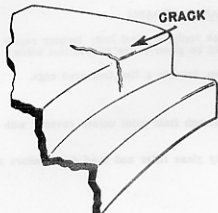


FIG. 6

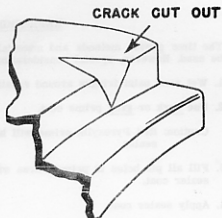


FIG. 7

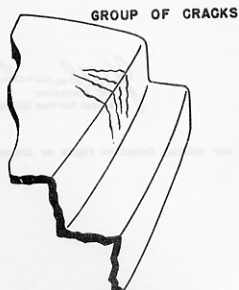


FIG. 8

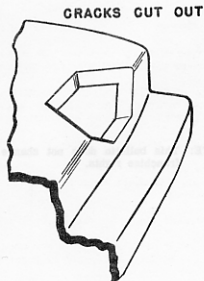


FIG. 9

2. Complete repair by one of the following two methods, whichever applies.

- a. If depth of prepared area does not penetrate through the body panel (Figure 7), build up to within 1/16" of the final surface contour with fiberglass strips or pieces saturated with the clear plastic mixture. Then follow operations 9, 10, 11, 12, and 13 under the heading "REPAIR OF CRACKED AREA".
- b. If the prepared area penetrates through the body panel (Figure 9), follow repair operations in part 2, "When Pieces Are Not Recovered" under "REPAIR OF HOLE IN BODY".

REFINISHING PLASTIC REPAIRS

The time proven methods and materials which apply to steel body lacquer repair should be used. However, special consideration should be given to the information below.

1. Wet sand paint fringes around repaired area down to a fine feathered edge.
2. Use dark or gray prime coat.
Caution: Red Pyroxylin prime will bleed through final paint unless covered with a dark sealer.
3. Fill all pin holes in primed area with putty glaze filler and sand down before applying sealer coat.
4. Apply sealer coat.
5. Sand sealer coat for final surface color.
6. Apply final color. Always use Lacquer.
7. Allow to dry.
8. Rub out with good rubbing compound.
9. Polish car.

K-W No. 258

September 15, 1954

BODY


J. W. Alexander
General Service Manager

PLASTIC BODY
REPAIR

NOTE: This bulletin does not change any existing franchise rights or create any new franchise rights.

MODEL

KAISER-DARRIN
MODEL 161
SPORTS CAR

KAISER-FRAZER SALES CORPORATION
WILLOW RUN, MICHIGAN

SERVICE BULLETIN



TO ALL DISTRIBUTORS AND DEALERS:

No. 369

November 24, 1952

It has come to the attention of the factory that distributor mounting adapters, Part No. 200162 and 207356, have been breaking off at the holddown flange.

To reduce the possibility of this breakage, when a new adapter is installed it is recommended that a $1/16$ " wide chamfer be ground or filed around the base of the adapter as illustrated below. The chamfer will prevent bottoming of the adapter at this point in the cylinder head counterbore, in case there is an excessive radius at the bottom of the counterbore.

ELECTRICAL

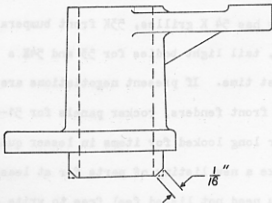
DISTRIBUTOR
MOUNTING
ADAPTER

A handwritten signature in cursive script that reads "J. W. Alexander".

J. W. Alexander
General Service Manager

MODELS

ALL
EXCEPT
HENRY J





WAREHOUSE 17W 461 HILL ST VILLA PARK ILLINOIS

Warehouse Capers

Winter has descended for the second time on The KFOC Warehouse since its inception in the Summer of 1962. With the temperature oscillating around zero the warmth of The Kaiser Frazer Owner's Club spirit around the world fend off Chicago's lousy surroundings making it possible for work on parts vital for our cars now and in the future to continue. Plans for the Warehouse's permanent home for sheet metal and heavier parts are well under way.

The Warehouse now has 54 K grilles, 53K front bumpers, Darrin bumpers and tail light bodies, tail light bodies for 53 and 54K's all in good quantities for the first time. If present negotiations are successful we will have 54K hoods & front fenders, rocker panels for 51-54 K in numbers desired and many other long looked for items in lesser quantities. The warehouse will not make a new listing of parts for at least 9 months so if there is something you need not listed feel free to write George or Don and They will let you know if it is in Warehouse stock.

May 1964 bring to all KFOC members the same enjoyment 1963 has. The Warehouse hopes all had an enjoyable Christmas and wishes everyone a Happy New Year.

George, Mary, Don & Elida

KAISER— DARRIN

OWNER SERVICE POLICY (Non-Transferable)

- 1. DELIVERY** — The selling Dealer will supervise the preparation of this vehicle for delivery to the original Owner in accordance with factory instructions.
- 2. OWNER'S IDENTIFICATION CARD** — An Owner Identification Card will be provided to the original Owner at the time of delivery of the vehicle. This will entitle him to any Kaiser-Darrin Service Station displaying the Kaiser-Willys approved Service Sign and enable the original Owner to receive service on set forth in this policy. It will be of assistance to the Owner if he will carry the Owner Identification Card with him at all times to facilitate the obtaining the services offered under this policy.
- 3. PARTS AND LABOR** — Should any original equipment, with the exception of tires, prove faulty in either material or workmanship during the first 30 days after delivery, or for the first 4,200 miles (whichever event shall first occur), the equipment will be replaced by any Authorized Kaiser-Darrin Service Station in the United States without charge to the Owner for material or labor.
- 4. 1,000 AND 2,000-MILE ADJUSTMENTS** — The attached coupons entitle the Owner to the listed inspections and adjustments. These services are given free by any Authorized Kaiser-Darrin Service Station in the United States in accordance with the terms expressed hereon. Repairs other than Warranty Service are to be charged for in the regular way.
- 5. INSPECTIONS** — Throughout the life of the vehicle the Owner is entitled to have it tested and inspected without any charge every 30 days or 1,000 miles by any Authorized Kaiser-Darrin Service Station in the United States, which such inspection or testing requires no dismantling of parts.
- 6. TOURIST PRIVILEGES** — Upon presentation of this Policy by the Owner when touring, any Authorized Kaiser-Darrin Service Station in the United States will perform the services as outlined in paragraphs three, four and five regardless of the Authorized Kaiser-Darrin Dealer from whom the vehicle may have been purchased.
- 7. CHANGE OF RESIDENCE** — In the case the Owner changes his residence from one location to another before his Warranty period has expired, the Authorized Kaiser-Darrin Service Station in the United States serving the locality into which the Owner moves will upon presentation of this Policy, render any no-charge service to which the Owner may be entitled as outlined in paragraphs three, four and five.



SELLING DEALER: Fill in First Eight Lines of Both Coupons Upon New Car Delivery. (Print)

coupon number **1**

**KAISER—
DARRIN**

1000-mile
inspection
coupon

(valid only within warranty period)

NO CHARGE will be made to the original owner for this inspection and Adjustment as shown on the reverse side of this coupon. This inspection will be made at 1000 miles of operation or 30 days (whichever occurs first), upon presentation of this coupon to the Selling Dealer, or any Authorized Kaiser-Darrin Service Station in the United States as provided in paragraph four of this Owner Service Policy. (VOID AFTER 1000 MILES.)

model no. _____ serial no. _____ engine no. _____
body type _____ date of sale _____
owner's name _____
address _____
town _____ state _____
selling dealer's name _____
town _____ state _____
distributor _____
I hereby acknowledge receipt of the Inspection and Adjustment Service called for on the back of this coupon. owner's signature _____
servicing station _____ signature _____
town _____ state _____
 mileage _____ date work performed _____
approved - distributor _____ (void must be shown)

coupon number **2**

**KAISER—
DARRIN**

2000-mile
inspection
coupon

(valid only within warranty period)

NO CHARGE will be made to the original owner for this inspection and Adjustment as shown on the reverse side of this coupon. This inspection will be made at 2000 miles of operation or 30 days (whichever occurs first) upon presentation of this coupon to the Selling Dealer, or any Authorized Kaiser-Darrin Service Station in the United States as provided in paragraph four of this Owner Service Policy. (VOID AFTER 2000 MILES.)

model no. _____ serial no. _____ engine no. _____
body type _____ date of sale _____
owner's name _____
address _____
town _____ state _____
selling dealer's name _____
town _____ state _____
distributor _____
I hereby acknowledge receipt of the Inspection and Adjustment Service called for on the back of this coupon. owner's signature _____
servicing station _____ signature _____
town _____ state _____
 mileage _____ date work performed _____
approved - distributor _____ (void must be shown)

MAINTENANCE SUGGESTIONS

Kaiser-Darrin Dealers in providing this Owner Policy know your requirements for continued satisfaction. Owners in turn may further increase this satisfaction by accepting the following recommendations:

1. Have all service contacts with Authorized Dealers in the area, including the Kaiser-Willys Approved Service Station to ensure experienced, conscientious service and the use of genuine Kaiser-Darrin parts when needed.
2. Keep brakes, lights, steering, horn, and windshield wiper in good working order at all times.
3. Follow recommendations with reference to complete lubrication.
4. Keep tires inflated in accordance with Kaiser-Darrin specifications.
5. Check water level in the battery regularly.
6. Check water level in radiator at regular periods and provide proper anti-freeze solution when temperature is near or below freezing point.
7. Follow factory recommendations for operating speeds when the vehicle is new.
8. Drive carefully — operating and maintenance costs go up with speed and careless driving. Safety, too, depends to a large extent on careful driving habits.

KAISER— DARRIN



Owner Service Policy

Name	_____
Address	_____
City, State	_____
Model	_____
Serial No.	_____
Engine No.	_____
Key No.	_____
Delivery Date	_____
Policy Issued By	_____

Form No. K. 1. A.

Inspection

LUBRICATION

Lubricate Car Complete (Owner to Pay)
Change Engine Oil (Owner to Pay)
Check Brake Fluid Level
Check Air Cleaner Oil Level
Test and Water Battery
Check Engine Coolant and Anti-Freeze
Check Tire Pressure

SHOP INSPECTION

Check Locks and Hardware
Check Instrument Operation
Check Switches and Controls
Check Clutch Operation and Free Play

Check Gear Shift Operation
Check Hand and Service Brakes
Check Steering
Check for Body Noises
Check Oil, Water and Fuel Lines
Tighten Cylindrical Head Cap Screws
Check All Drain Plugs and Cocks
Adjust Taps
Adjust Distributor Points
Check Spark Plug Gaps
Check Timing
Adjust Fan Belt Tension
Adjust Carburetor and Engine Idle
Tighten Rear Spring U-Bolts
Check Overdrive Operation
Road Test for Owner's Approval

Owner Inspection Coupon

Inspection

LUBRICATION

Lubricate Car Complete (Owner to Pay)
Change Engine Oil (Owner to Pay)
Test and Water Battery
Check Engine Coolant and Anti-Freeze
Check Tire Pressure

SHOP INSPECTION

Check Instrument Operation
Check Switches and Controls
Check Clutch Operation

Check Gear Shift Operation
Check Hand and Service Brakes
Check Steering
Check for Body Noises
Check all Drain Plugs and Cocks
Tighten Cylindrical Head Caps
Adjust Distributor Points
Check Spark Plug Gaps
Check Timing
Adjust Carburetor and Engine Idle
Road Test for Owner's Approval

Owner Inspection Coupon



KAISER-FRAZER



MONTHLY NEWS BULLETIN

JANUARY 1964

WELCOME 1964

A year to remember, 1963 It was quite a year, full of unusual weather, new friendships, and a National tragedy that will long be remembered in history. I think we will ALL welcome 1964 with new hope, faith, and anticipation. Regardless of how late it may be, may we here at the Bulletin and Quarterly offices wish you and yours a VERY HAPPY and PROSPEROUS NEW YEAR. 300....

V I S I T

Member Bob Burke from Yankton, S Dakota paid we Minneapolis members a visit last month in his 51 Frazer Vagabond. Bob has several Frazers and one 54 Kaiser. His Vagabond was rescued from the junk yard for \$25 and is being driven daily now. Bob admired John Haller's Frazer Convertible and is now looking for one of his very own. ANYONE selling?

W I S C O N S I N NEWS

The Wisconsin region met Dec 15th at Dave Kuehls at 233 E 10th St Fond du Lac. It was a meeting of the officers and Board of Directors and their wives. Dan Danyo writes that all had a good time. We Mpls members will attempt to attend the next one Dan, don't give up hope.

HURRAH FOR HURRAH'S.....

YOUR EDITOR RECEIVED A LETTER FROM RALPH DUNWOODIE, MANAGER OF HURRAH'S AUTOMOBILE COLLECTION IN RENO NEVADA.

"We have just purchased a 1947 Kaiser 2 door from Bob Gehrig of the Gerhig Rubber Mfg Co. The rear seat is horseshoe shaped and the right front seat does not fasten to the floor and can be moved anywhere. Both front fenders bear the script PINCONNING SPEC. We are currently negotiating for the purchase of a 1955 Kaiser Manhattan." He went to ask questions regarding these cars and concluded.. "We would appreciate any advise or assistance you may be able to give us concerning these cars." Your Editor answered his letter with what little info I had on the Pinconning Special BUT I am afraid I was little help. I would like therefore to ask publicly.. any member able to shed

any more light regarding this car to write directly to Mr Ralph Dunwoodie Manager Hurrah's Auto Collection PO Box 10 Reno Nevada.

At Last a Keiser in a museum where one should be. I think it is noteworthy to pass along what little info your editor has regarding this fabulous collection. They are housed in 3 large buildings around Reno and total well over 500 cars. WOULDNT THIS BE A FANTASTIC PLACE TO HOLD A MEET? From the book he publishes listing his cars we noted that once he starts on a make of car, he rarely quits until he has restored a complete line of such cars. Needless to say your Editor's reply suggests that he do the same with the Kaiser Frazer line. All letters of encouragement sent to him by members will be appreciated by your editor.

Perhaps now Kaisers and Frazers will at long last take their place among the Vintage and Classic cars forever..... and rightly so.

FROM PACKARD TO KAISER FRAZER

Your editor has taken a lot of rebuffs lately because he insists on driving a Packard Caribbean, as well as several KPs's. But smiles thru the criticism which comes mostly from John Heller. NCW at long last I have finally found a connection between the Packard Corp and the KP Corp.

While reading this month's Cormorant (the Packard Automobile Classics Club's Quarterly Publication) I found this article on Packard Advertising by Robt Stinnet... Austin F Bement built up the confidence of the Packard Corp in the 20's as reflected in the advertising policy wonderfully created by Mr Bement. It was these piece of art that put Packard out in front in prestige. Now over 35 years since they were created Bements Packard Ads are considered classics in themselves

Mr Bement now lives in Detroit. His most recent automotive venture was in handling the Kaiser Frazer account when that firm initially introduced their autos.....

No wonder those fine magazine ads (I'm trying so hard to collect) are so beautifully done. (See John?)

C A R A D S

Due to losing my uncle's farm for storage space I am forced to offer most of my complete collection of cars for IMMEDIATE DISPOSAL.....

51 Golden Dragon: Motorless, rough but restorable, w/spare parts...\$40

53 Manhattan 4 dr Motorless, little rust on body, good parts car...\$25

53 Manhattan 2 dr club sedan Rusty by Trusty, very good motor & Trans. fair interior w/ perfect black bamboo interior to go in it Runs Good \$90

54 Special Motorless but rust free near perfect body (from Texas) needs motor and paint w/radio.....\$50

54 Manhattan Wrecked parts car...\$15

OR TAKE ALL 5 CARS FOR \$200

55 Packard Caribbean Conv.....\$650

all inquiries promptly answered by your Bulletin Editor..Jack Edwards
6019 Upton Ave S Minneapolis 10 Minn

FOR SALE

52 Virginian 2 dr \$1500 invested in rebuilt engine, stick, 4 new w/w/tires paint, new interior, carpets etc. Sacrifice for \$700
Ed Sobczynski Rtl Box 237 Cary Ill.

53 Manhattan Grey 4 dr original owner, fair interior R&E \$65
Carl Fasbender 16414 Log Cabin
Detroit Michigan UN3 8714

54 Manhattan tubone green No super charger, very clean inside and out.
Don Mills 41 Warren St Bath New York

F O R S A L E CONTINUED

54 Manhattan with regular 54 for motor and parts, really nice one. Both for \$130. Bill Oberhelman
124 N 18th St Ft Dodge Iowa
Phone 573-4725

54 (two) one with overdrive, SPEC with Hydra. Both driven daily... (WANT DRIVEABLE DARRIN) price open
Dor B Grau 3920 Kingman DesMoines Iowa

W I N T E D T O B U Y

1 or 2 Chrome plated oval shaped head light doors for 54 Kaiser, new or used
Joseph J Reusch 444 Hillside Ave
Elmhurst Ill.

Lardau Bars for Darrin top. Can anyone HELP?
Al Perry 688 Loop Dr Camerille Calif.

DAFRIN wanted. Please send details on condition and asking price. Also supercharger shop manual.
Capt C C Robbins USN. Naval Ammun, depot Charleston South Carolina

Wart 51 Frazer Convertibel
Bot Burke 1208 Walnut St Yankton
South Dakota

WANTED TO TRADE

Have many KF Magazine ads to trade for 47-49-52 or 55 Owners manuals.
Have spare parts including a pink alligator interior, electric wiper, unbroken 54 clock. Need 53 Travler lower deck lid. Tom Erickson 2793
Dorwell St Paul Minn. Also have 54 Manhattan with hydra. trade for 51 or newer KF Product with OD. Prefer 54 Special with CD

Articles of interest to other members for space in this Bulletin. This is the best bargain you can get. Reach over 400 interested people for free. Send your news items and ads to
KAISER FRAZER OWNERS CLUB BULLETIN
6019 Upton Ave S Minneapolis 10 Minn.
D C I T N O W.....

Back in June 1963 we began to think of the National Kaiser-Fraser meeting to be held at New Hope, Pennsylvania. A few of us asked around, but none of us were going to be able to make the meet. The next best thing seemed to be to try a local meet.

Letters--26 of them-- were sent to K-F Club members who lived within easy driving range of the San Francisco Bay area to announce a K-F meet and picnic at a picnic grounds in the Santa Clara Valley on (a sunny) Sunday, September 15, 1963. Ads run in the Sport Car - Classified section of the San Francisco papers netted several replies and two K-F owners who are now club members.

Thirteen fellows brought thirteen K-F cars as well as wives, children and friends. Thirteen shined up K-Fs really attracted attention, not only of the special group, but also from the entire picnic area. We had lots of sightseers. Some of the fellows did not bring their cars--they are still in the process of restoring them; some of the fellows brought more than one. But the interest of all was high.

A few notes about the cars: Orra brought a 49 K Traveller that he had rebuilt himself (better than new). Ankers brought a F four-door convertible that would make anyone look twice, and a sharp 53 K Dragon. Wenzel had the only Darrin, and they are still tops in sport car looks. He also brought a Henry J restored in top shape.

Leimer had a 54 K Special with the paint so fresh he was still putting chrome back on Sunday morning. It looks like new. Redmond brought a 55K Manhattan with a V8 motor, cream body with coral leather interior--unnnuh. Thomson brought his 54 and Sharman a real nice 54 K Manhattan. He has put lots of miles on it, but it sure doesn't show its age. Fisher and Headley are each restoring a 48 F and hope to have them for our next meet.

Merdinger had a 2 door 53 K Manhattan, dark and light gray, real clean, and it ran beautifully. Allen brought a 53 K. He had a hard time deciding which of his eleven--yes, eleven-- cars to bring. Schroyer has two Travelers and a Manhattan. So what did he drive? His Lincoln. He and his son couldn't decide which one to bring.

Everyone brought plenty of good picnic food--steak, chicken, even two TV dinners with the oven to cook them. Schroyer brought old fashioned home made ice cream for the whole crowd, and Schenks passed pieces of banana cake to everyone. What a treat.

Between eating and looking we managed a short business meeting to set



KAISER-FRAZER

MONTHLY NEWS BULLETIN



plans for a spring business session which will result in preparing for a state-wide California meet in the summer or fall. It won't be at the same time as the national meet, because some of us have hopes of making Canada in 64.

If anyone has any ideas about a bigger, better K-F get together in California in 64, please write to one or the other of us:

Lynn Ankers 1622 Grant Road Los Altos, Calif.

Dick Leimer 3015 - 142 E. Bayshore Blvd. Redwood City, Calif.

Dick Wenzel 100 Ferne Palo Alto, Calif.

Families attending:

Roger Merdinger, Palo Alto

Al Fisher, Lodi

Dana Headley, Lodi

Ken Thompson, Oakland

Robert Schenk, Palo Alto

Richard Allen, Napa

Lynn Ankers, Los Altos

Dick Leimer, Redwood City

C. F. Orra, Castro Valley

Richard Wenzel, Palo Alto

Jim Sharman, Mountain View

Andy Schroyer, Palo Alto

Daniel Redmond, Emeryville

TOP ROW 1. GENERAL VIEW 2. DICK LEIMER'S 54 SPECIAL NEEDS
BUMPER POSTS WATCH THE FRESH PAINT
3. WENZEL'S 49 K CONV, DARRIN 4. MEETING TO PLAN OUR NEXT MEET
HENRY J & 54 MANHATTAN
ANKER'S 49 FRAZER CONVERTIBLE
5. MR ORRA AND HIS 49 VAGABOND 6. MORE KAISERS AT THE MEET
7. CHOW TIME ALONG SIDE OF THE 8. ANKER'S 53 DRAGON ALLEN'S 51
55 V 8 OF DAN REDMOND KAISER LEIMER'S 54 SPECIAL



Route 4
Fond du Lac, Wisconsin
October 28, 1963

Mr. Dean Moore
Box 691
St. Louis 88, Missouri

Dear Sirs:

I arranged on Sunday, September 29, a meeting at the Peters' farm, rural Fond du Lac, for Kaiser-Frazers owners in conjunction with the Steam Club, Early Day Gas Engines, and the Horseless Carriage Club. The following are those who attended with K-F cars.
Dave Krueger and Shirley MacClaine, Fond du Lac, 1953 Kaiser Man.
Jack Krueger and Judy Collins, Fond du Lac, 1952 Kaiser Man.
Mr. & Mrs. Orville Voeks, Sheboygan, 1951 Kaiser Dragon
Mr. & Mrs. Robert Strade, Glendale, 1953 Kaiser Man., & 1954 Kaiser Man.
Elroy Ehler, Appleton, 1953 Kaiser Man. 2dr.
Neal & Irene Danyo, West Bend
Norb & Nina Gilgenbach, Fond du Lac, 1953 Kaiser Man.

At this meeting, I suggested an organizational meeting for the formation of the Wisconsin region of the KFOG. This meeting was planned and held at Neal Danyo's Ranch, West Bend on Oct. 20. Neal Danyo and I invited K-F owners in Wisconsin. The meeting was a big success. The following are those who signed to form a Wisconsin region:

Non-member, Mrs. E. McCullough, Sr., X, 244 N. Macy St., FDL, Wis. - '53 Kaiser Man.
" " Don E. Burr
member, Norb Gilgenbach, Route 4, FDL, Wis. - '53 Kaiser Man.
member, Dave Krueger, 285 E. 10th. St., FDL, Wis. - '53 Kaiser Man.
member, Oliver C. Fick, 1215 12th. Ave., Grafton, Wis. - '47 Kaiser Special
Non-member, Ewald Faulstich, X, 4625 N. 19th. St., Milwaukee, Wis. - '48 Kaiser
member, Elroy Ehler, 631 E. Calumet St., Appleton, Wis. - '53 Kaiser Man.
Non-member, Ernest C. Shorke, 2410 E. 55th. St., Mil., Wis. - '51 Kaiser Traveler I
Non-member, Warren E. Slock, X, 4234 E. 22nd. St., Mil., Wis. - '51 Frazer Vagabond
member, Bruce Lamphere, Route 1, Arkansas, Wis. - '54 Kaiser Special
Non-member, Milton E. Kock, X, 8119 N. Whitney Road, Milwaukee 17, Wis. - '50 K Virg!
Member, Neal Danyo, P.O. Box 82, West Bend, Wis.
member, Jack Krueger, 285 E. 10th. St., Fond du Lac, Wis.
Non-member, Miss Carol Gilgenbach, Route 4, Fond du Lac, Wis. - '54 Kaiser Mahh!

The names with an X are non-members, but have received KFOG membership blanks.

Enclosed are two pictures from the Sept. 29 meeting.

At the Oct.20 meeting,nominated to office and elected were:

Norb Gilgenbach,President
Dave Krueger,Vice-President
Mrs.Ned Danyo,Secretary
Neal Danyo,Treasurer

Members of the Board of Directors

Neal Danyo
Dave Krueger
Oliver C.Pick
Elroy Ehlert
Bruce Lamphere

Name suggested for the Wisconsin Region,if other states use names for their regional group.The Steering Cloumn was suggested for the Wisconsin Region.

If there is other business that is connected with this regional group,please let me know.

Sincerely yours,

Norb Gilgenbach
Norb Gilgenbach



For Easy **Extra** Profits . . .
Sell *Nationally Advertised*

Miracle Power

The Petroleum Lubricant
that Protects Engines
with Colloidal
Synthetic Graphite



PART NO. 100281

What Miracle Power Is:

Miracle Power contains only pure colloidal synthetic graphite permanently suspended in petroleum oil. Miracle Power is not a chemical, detergent, or solvent—does not change the viscosity or other qualities built into the oil by the refiner. Miracle Power is all lubricant . . . treats the engine not the oil.

What Miracle Power Does:

In the oil—Miracle Power protects frictional surfaces with a graphoid film that clings to metal—prevents **DRY STARTING** damage by providing stand-by lubrication until a complete oil film is established.

In the gas—the graphite in Miracle Power provides *effective* top-cylinder lubrication at red hot combustion chamber temperatures.

Recommended for:

NEW CARS

To help protect against harmful scuffing during the critical break-in period.

USED CARS

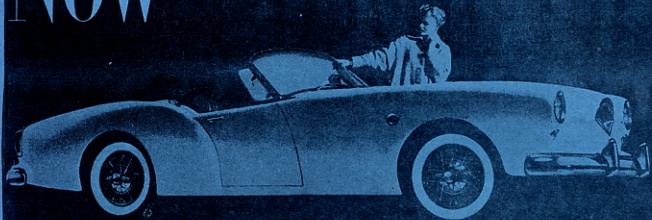
To help restore lost compression and engine efficiency . . . safely, economically.

REGULAR SERVICE

An extra profit item at lubrication and oil change intervals for all cars.

KAISER-FRAZER SALES CORPORATION
KAISER MOTORS CORPORATION • WILLOW RUN, MICHIGAN

Now *the most exciting new car for '54...* !



Kaiser-Darrin 161

America's newest and finest sports car!

You've seen other new cars for '54, but nothing as exciting as this. It's the fabulous Kaiser-Darrin 161—the new name in sports cars, the last word in elegance—in production and for sale!

Its armour-clad Fiberglas body is the lowest, sleekest on the road. Its revolutionary sliding doors and disappearing Deauville-style top set a refreshing new fashion. Its elegance of appointment challenges custom designers either side of the Atlantic.

Styled by Darrin of Paris and built by the great new Kaiser-Willys combination, it has an amazingly high power-to-weight ratio that assures highest competitive performance. And when equipped with optional variable-drive supercharger, its acceleration will literally take your breath away.

Ask your Kaiser-Willys dealer about it today. (If he doesn't have it now, he'll have it soon!) And drive it—soon! It's the outstanding pleasure car of our time!

Another outstanding product of the great new Kaiser-Willys combination,

makers of: The beautiful Kaiser  The smart Aero Willys