SUMMARY STATISTICS

The following statistics are as nearly up-to-date as was practicable at the time the Year Book went to press. Wherever possible, last-minute, 1955 figures were included in the main text of the book, and may be found under appropriate chapter headings.

The Editors

AVERAGE WEEKLY HOURS IN THE AIRCRAFT, ENGINE, PROPELLER, AND PARTS INDUSTRY

(Source: Aircraft Industries Association)

Year and Month	Aircraft and Parts	Aircraft	Aircraft Engines and Parts	Aircraft Propellers and Parts	Other Aircraft Parts and Equipment
1953	41.9	41.3	43.0	41.9	42.8
1954	40.9	40.9	40.7	39.4	41.2
1955					
January	41.4	41.6	41.1	40.0	41.5
February	41.1	41.3	40.7	39.8	40.9
March	41.3	41.5	41.0	39.8	40.9
April	40.7	40.8	40.4	39.9	40.5
May	41.0	41.0	40.7	39.8	41.2
June	41.0	41.0	40.5	40.7	41.5
July	41.2	41.1[a]	41.3[a]	40.5[a]	41.5[a]
August	41.0	41.1	39.5	43.0	42.0

AVERAGE WEEKLY EARNINGS

1953	83.80	82.19	87.29	85.90	85.17
1954	85.07	85.07	85.06	82.35	85.70
1955					
January	88.81	89.44	87.54	83.60	88.40
February	87.95	88.80	86.69	84.28	86.71
March	88.38	89.23	87.74	84.77	86.71
April	87.10	87.72	85.65	84.99	85.86
May	88.15	88.56	87.10	84.38	87.76
June	88.15	88.15	86.67	87.91	89.64
July	89.40[a]	89.19[a]	89.62[a]	88.70[a]	90.06[a]
August	88.97	89.19	85.72	95.89	91.98

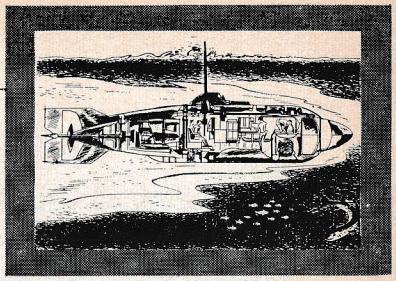
AVERAGE HOURLY EARNINGS

1953	2.00	1.99	2.03	2.05	1.99
1954	2.08	2.08	2.09	2.09	2.08
1955					
January	2.14	2.15	2.13	2.09	2.13
February	2.14	2.15	2.13	2.12	2.12
March	2.14	2.15	2.14	2.13	2.12
April	2.14	2.15	2.12	2.13	2.12
May	2.15	2.16	2.14	2.12	2.13
June	2.15	2.15	2.14	2.16	2.16
July	2.17	2.17	2.17[a]	2.19	2.17[a]
August	2.17	2.17	2.17	2.23	2.19

[a] **Revised**

PRIVATE EYE FOR THE U. S. NAVY

NUMBER 10 OF A SERIES



Incorporated in the X-1 are all personnel living essentials of larger subs. Crews are just as safe, just as comfortable, as those in large subs.

Because of its maneuverability in shallow water, and its agility in finding secure hiding places, the X-1 is a highly versatile addition to our Navy.

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New tactical mobility is brought to many U.S. Navy operations by the Fairchild X-1, a revolutionary underwater weapons system for close-in reconnaissance of harbors and inlets. The X-1 is the first of its kind ever produced in America, and the first naval vessel of any kind to be designed and constructed by a U.S. aircraft manufacturer.

Fairchild designed and built the 25-ton, 50-foot X-1 with an unconventional underwater propulsion system, and with airplane-like controls. The new "pocket" sub has a four-man crew—operates quietly and stealthily, performing missions that large craft could never do.

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...WHERE THE FUTURE IS MEASURED IN LIGHT-YEARS

FAIRCHILD

ENGINE DIVISION • DEER PARK, L. I., N. Y.

A Division of Fairchild Engine and Airplane Corporation

NUMBER OF ENGINES PRODUCED

1917-1955

	Total	Military	Civil
1917-1919	N.A.	44,453	N.A.
1932	1,896	1,085	813
1933	1,980	860	1,120
1934	2,736	688	2,048
1935	2,965	991	1,974
1936	4,237	1,804	2,433
1937	6,084	1,989	4,095
1938	N.A.	N.A.	N.A.
1939	11,172	N.A.	N.A.
1940[a]	N.A.	22,667	N.A.
1941[a]	N.A.	58,181	N.A.
1942[a]	N.A.	138,089	N.A.
1943[a]	N.A.	227,116	N.A.
1944[a]	N.A.	256,911	N.A.
1945[a]	N.A.	109,650	N.A.
1946	43,407	2,585[b]	40,822
1947	21,178	4,808	16,370
1948	N.A.	N.A.	9,039
1949	N.A.	N.A.	3,982
1950	N.A.	N.A.	4,314
1951	N.A.	N.A.	4,580
1952	34,382[c]	29,000[c]	5,382
1953	41,647[c]	35,000[c]	6,647
1954	30,519[c]	25,000[c]	5,519[c]
1955	32,639	25,000	7,639

[a]Excludes aircraft engines produced for other than aircraft use.
[b]Excludes experimental engines, engines classified by the armed forces as secret or confidential, engines for non-man-carrying, pilotless aircraft, jet assist mechanisms.
[c]AIA estimate.

Source: 1917-1747—AIA Aircraft Year Book, 1948, P. xxl.
1948-1955—Bureau of Census Facts for Industry Series M42A.

SHIPMENTS OF CIVIL AIRCRAFT ENGINES

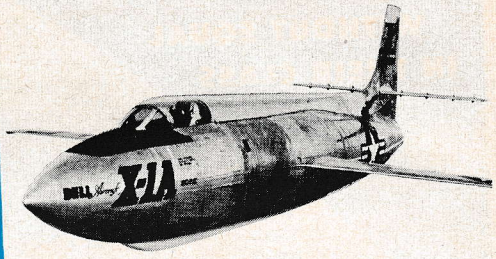
1955

(Source: Bureau of Census, Facts for Industry, Series M42A.)

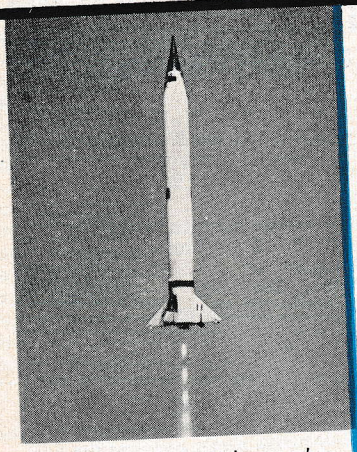
Month	Number of Engines	Horsepower (in thousands)	Total Value (Thousands of Dollars)
January	626	321	5,996
February	626	328	6,115
March	680	341	6,319
April	657	288	5,169
May	704	280	4,780
June	706	258	4,329
July	552	235	4,146
August	464	184	3,177
September	577	228	3,807
October	614	251	4,285
November	688	272	4,677
December	775	352	6,347

first and foremost in

ROCKET POWER



★ *World speed and altitude record holder for piloted aircraft . . . RMI rocket powered Bell XI-A.*



★ *World speed and altitude record holder for single stage rockets . . . RMI rocket powered Martin Viking high altitude research rocket.*

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- Aircraft powerplants
- Ordnance rocket propulsion
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- Launching and ejection devices
- Auxiliary power units
- Boundary layer control

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RMI

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OF

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AVIATION CORPORATION

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TOTAL EMPLOYMENT IN AIRCRAFT AND PARTS INDUSTRY[1]

(In thousands)

Source: Aircraft Industries Association

Years and Months	Total	Aircraft	Aircraft Engines & Parts	Aircraft Propellers & Parts	Other Aircraft Parts & Equipment
1953					
January	763.0	473.4	167.2	17.5	104.9
February	774.5	475.6	173.9	17.9	107.1
March	784.1	478.8	176.6	18.0	110.7
April	773.8	475.1	169.4	17.9	111.4
May	772.6	472.3	171.0	17.8	111.5
June	776.0	469.9	175.4	17.7	113.0
July	781.4	471.7	177.0	17.6	115.1
August	788.5	476.2	176.8	17.5	118.0
September	795.0	479.6	178.6	17.8	119.0
October	790.3	476.4	179.1	17.7	117.1
November	766.3	452.9	176.2	17.6	119.6
December	783.6	467.0	175.5	17.6	112.0
1954					
January	799.0	483.9	172.8	17.4	124.9
February	789.8	476.5	171.4	17.1	124.8
March	786.2	475.6	170.2	16.7	123.7
April	779.3	476.1	166.5	13.2	123.5
May	769.0	472.9	161.5	12.5	122.1
June	765.6	470.2	158.4	16.7	120.3
July	764.7	474.5	154.9	16.6	118.7
August	754.4	474.9	146.5	16.5	116.5
September	756.7	471.2	153.3	16.4	115.8
October	748.0	466.2	151.6	16.1	114.1
November	751.4	468.2	149.9	15.7	117.6
December	753.5	470.9	150.0	15.3	117.3
1955					
January	752.6	472.8	149.0	14.3	116.5
February	753.2	477.0	148.6	14.1	113.5
March	752.0	477.1	148.8	13.9	112.2
April	749.1	478.0	146.6	13.6	110.9
May	740.9	476.8	143.1	13.4	107.6
June	738.7	476.3	142.1	13.3	107.0
July	742.3	481.9	140.7	13.2	106.5
August	741.4	482.1	140.5	13.2	105.6
September	749.3	485.5	143.2	13.5	107.1
October	754.3	488.3	144.5	13.6	107.9
November	765.1	493.4	148.3	13.9	109.5

[1]As of pay period ending nearest 15th of the month.

Note—These data have been revised on the basis of the 1954 benchmark.

RTS

Other Aircraft Parts & Equipment
104.9
107.1
110.7
111.4
111.5
113.0
115.1
118.0
119.0
117.1
119.6
112.0
124.9
124.8
123.7
123.5
122.1
120.3
18.7
16.5
15.8
14.1
17.6
17.3
15
15
12
19
15
10

Here is America's first commercial jet airliner

Big aviation news was made in 1955 by Boeing's jet transport 707, pictured here as it will look in airline service. Its prototype has been flying for over a year and a half. In more than 350 hours of flight test it has repeatedly flown well above 40,000 feet and at speeds above 600 miles per hour.

Deliveries to the leading airlines which have ordered the big Boeing jets will begin in late 1958, and first scheduled service is planned in the spring of 1959. Such early operation is possible because of knowledge gained from the 707 prototype, and the vast experience accumulated in producing more than 1,200 B-47 and B-52 multi-jet bombers.

The Boeing 707 has flown from coast to coast and back in 486 minutes! The new Stratoliners will fly on schedules of 4 hours, 15 minutes from Los Angeles to New York. And the still larger Intercontinental version, ordered for transocean service, will reach European capitals in 5½ to 6 hours after leaving New York.

Incorporated in the Boeing jets is the company's 20-year experience in building multi-engine, pressurized airplanes — and a full 39 years of experience in aircraft production. It is typical of Boeing leadership that this company has designed and built America's first jet transport.

BOEING

U. S. CIVIL AIRCRAFT

By States

(Source: Civil Aeronautics Administration)

State	Number of civil aircraft[1] Jan. 1, 1954	Jan. 1, 1955	State	Number of civil aircraft[1] Jan. 1, 1954	Jan. 1, 1955
TOTAL	91,102	92,067	Montana	1,179	1,168
			Nebraska	1,763	1,737
Alabama	747	718	Nevada	471	476
Arizona	1,262	1,259	New Hampshire	215	221
Arkansas	1,093	1,104	New Jersey	1,931	1,960
California	10,369	10,635	New Mexico	772	830
Colorado	1,256	1,250	New York	4,497	4,598
Connecticut	629	685	North Carolina	1,600	1,615
Delaware	210	210	North Dakota	1,148	1,148
District of Columbia	567	512	Ohio	4,309	4,436
Florida	2,686	2,743	Oklahoma	1,996	1,958
Georgia	1,242	1,255	Oregon	1,760	1,723
Idaho	870	855	Pennsylvania	3,910	3,830
Illinois	5,030	5,152	Rhode Island	197	203
Indiana	2,757	2,786	South Carolina	592	567
Iowa	2,064	2,066	South Dakota	1,130	1,075
Kansas	2,503	2,433	Tennessee	923	928
Kentucky	704	721	Texas	6,740	6,829
Louisiana	1,284	1,338	Utah	481	503
Maine	527	515	Vermont	158	158
Maryland	864	913	Virginia	1,237	1,244
Massachusetts	1,431	1,406	Washington	2,260	2,297
Michigan	3,899	3,940	West Virginia	602	574
Minnesota	2,164	2,242	Wisconsin	1,967	1,908
Mississippi	868	936	Wyoming	506	514
Missouri	2,050	2,123	Outside U. S. A.	1,682	1,770

[1]Includes gliders.

CIVIL AIRCRAFT PRODUCTION

Number of Units

(Source: Bureau of the Census, Facts for Industry, Series M42 A)

Month	1951	1952	1953	1954	1955
January	255	224	365	278	350
February	239	227	382	240	357
March	272	248	358	312	478
April	247	291	402	359	438
May	248	330	417	309	486
June	216	335	339	316	538
July	207	353	402	293	354
August	171	349	350	265	241
September	184	337	359	265	.....
October	124	293	235	174	.....
November	162	268	275	288	.....
December	152	254	250	290	.....
TOTAL	2,477	3,509	4,134	3,098	.....

AIRPORTS AND LANDING FIELDS

1927-1954

(Source: Civil Aeronautics Administration)

Calendar Year	Total	Commercial	Municipal	CAA intermediate	All others
1927	1,036	263	240	134	399[2]
1928	1,364	365	368	210	421[2]
1929	1,550	495	453	285	317[2]
1930	1,782	564	550	354	314[2]
1931	2,093	829	780	404	80
1932	2,117	869	777	352	119
1933	2,188	938	827	265	158
1934	2,297	872	980	259	186
1935	2,368	822	1,041	291	214
1936	2,342	774	1,037	296	235
1937	2,299	727	1,053	283	236
1938	2,374	760	1,092	267	255
1939	2,280	801	963	266	250
1940	2,331	860	1,031	289	151
1941	2,484	930	1,086	283	185
1942	2,809	1,069	1,129	273	338
1943	2,769	801	914	240	814
1944	3,427	1,027	1,067	229	1,104
1945	4,026	1,509	1,220	216	1,081
1946	4,490	1,930	1,424	201	935
1947	5,759	2,849	1,818	178	914
1948	6,414	2,989	2,050	161	1,214
1949	6,484	2,585	2,200	139	1,560
1950	6,403	2,329	2,272	76	1,726
1951	6,237	2,042	2,316	57	1,822
1952	6,042	N.A.	N.A.	N.A.	N.A.
1953	6,760	N.A.	N.A.	N.A.	N.A.
1954	6,977	N.A.	N.A.	N.A.	N.A.

N.A. Not Available.

[2]Include auxiliary marked fields, later classified as to ownership, commercial or municipal.

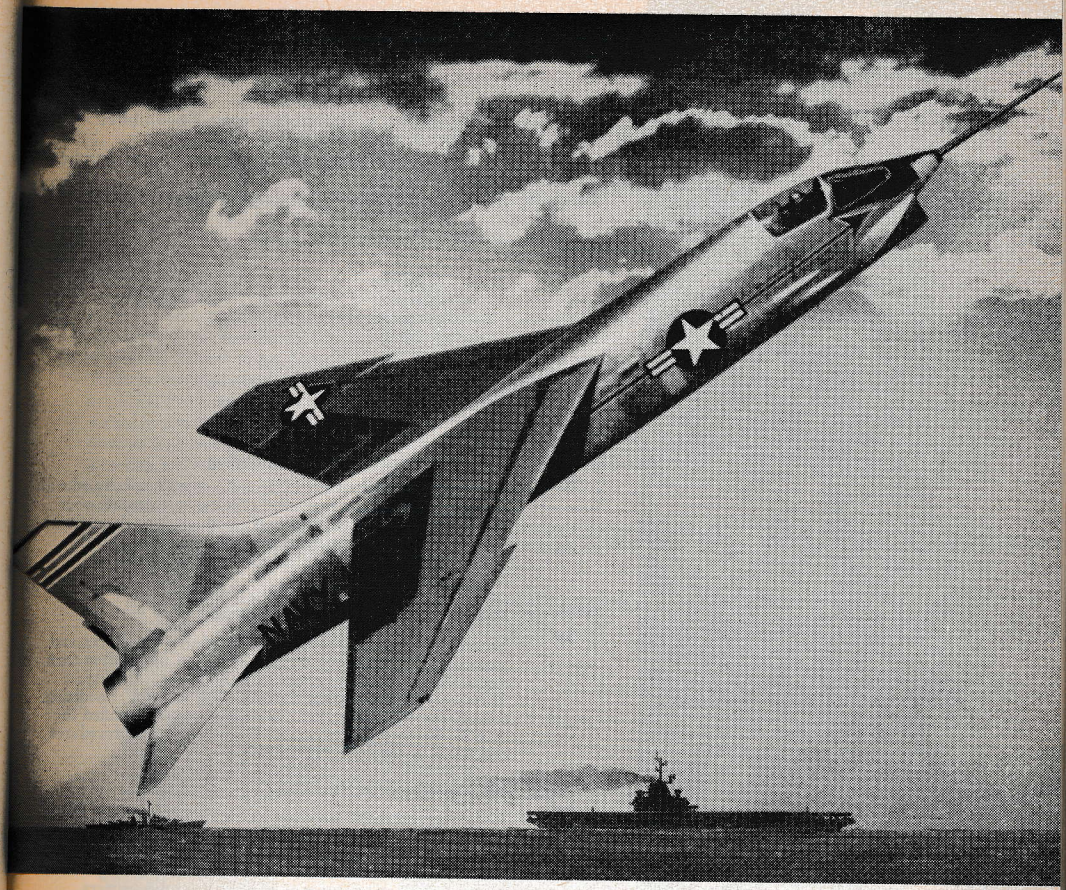
ALLOCATIONS AND APPROPRIATIONS FOR AERONAUTICS, U. S. ARMY

1899	Langley experiments.	$25,000
1900	Langley experiments.	25,000
1908	Baldwin dirigible, revoked and later applied toward payment for Wright plane.	25,000
1909	Herring & Scott airplanes. Later for Wright plane.	21,000
1910	Wright plane.	9,000
1912	Signal Service of Army.	125,000
1913	Signal Service of Army.	100,000
1914	Signal Service of Army.	125,000
1915	Signal Service of Army.	50,000
		$505,000

AVERAGE SPEED
(Miles Per Hour)

Domestic Scheduled Air Carriers
(Source: CAA Statistical Handbook)

Year	Average speed (miles per hour)
1947	168.2
1948	171.9
1949	179
1950	181.2
1951	184.6
1952	190.8
1953	197.8
1954	205.8



The Navy's "Crusader" Carries a Zenith Plastic Shield

This shield is the nose radome of the Chance Vought F8U, protecting the latest contributions of science to its fighting efficiency in the air.

These ultra-sensitive electronic devices help to make it possible for this fastest of Navy fighters to stab through the sonic barrier in level flight straight to the heart of an enemy intruder.

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Extensive Research and Development

Kawneer research is backed by over 50 years of experience in metal working; years that have seen Kawneer discover new processes that have revolutioniz metal shaping methods. Kawneer maintains complete equipment necessary for chemical and physical research. Possibly this development work can be used to your advantage.

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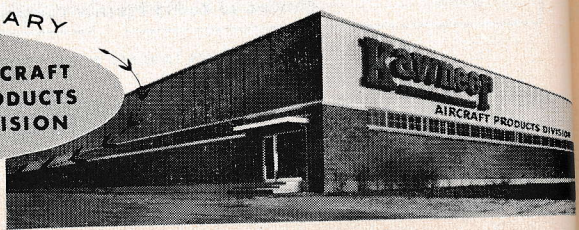
50TH ANNIVERSARY

Kawneer
General Offices
NILES, MICHIGAN

AIRCRAFT PRODUCTS DIVISION

1906 – 1956



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Precision Parts. Hardened and ground parts for almost every conceivable use.

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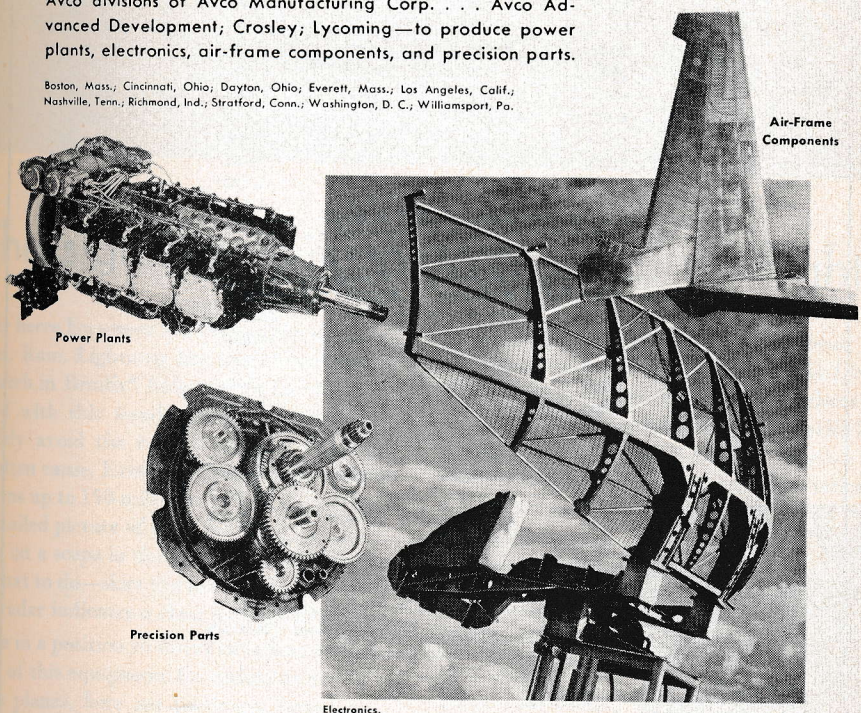


Air-Frame Components

Power Plants

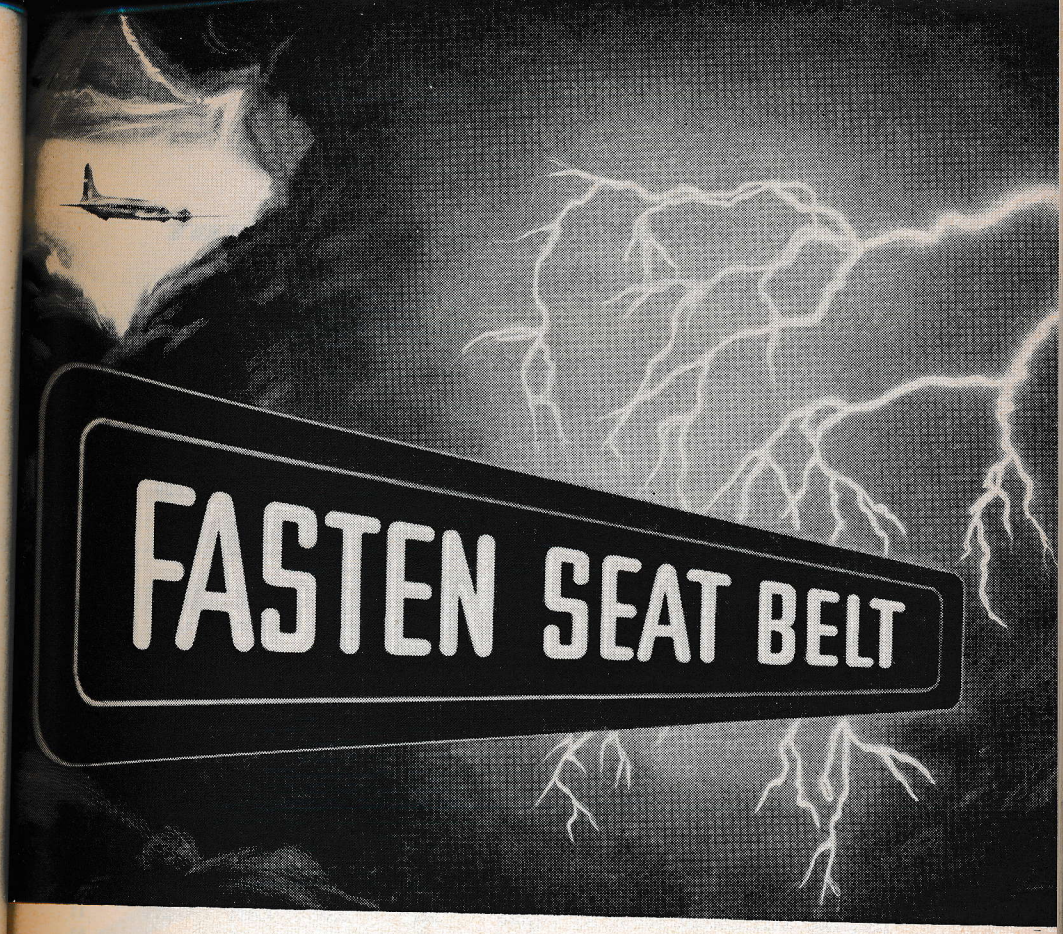
Precision Parts

Electronics.

U.S. AIRCRAFT PRODUCTION
(units)
1914-1955
(Source: Aircraft Industries Association)

Year	Total	Military Aircraft	Civil Aircraft
1914	49	15	34
1915	178	26	152
1916	411	142	269
1917	2,148	2,013	135
1918	14,020	13,991	29
1919	780	682	98
1920	328	256	72
1921	437	389	48
1922	263	226	37
1923	745	689	56
1924	377	317	60
1925	789	447	342
1926	1,186	532	654
1927	1,995	621	1,374
1928	4,346	1,219	3,127
1929	6,193	677	5,516
1930	3,437	747	2,690
1931	2,800	812	1,988
1932	1,396	593	803
1933	1,324	466	858
1934	1,615	437	1,178
1935	1,710	459	1,251
1936	3,010	1,141	1,869
1937	3,773	949	2,824
1938	3,623	1,800	1,823
1939	5,856	2,195	3,661
1940	12,804	6,019[a]	6,785[b]
1941	26,277[c]	19,433[a]	6,844[b]
1942	47,836[c]	47,836[a]	[d]
1943	85,898[c]	85,898[a]	[d]
1944	96,318[c]	96,318[a]	[d]
1945	49,761[c]	47,714[a]	2,047
1946	36,670	1,669	35,001
1947	17,717	2,100	15,617
1948	9,586[e]	2,284[e]	7,302
1949	6,089[e]	2,544[e]	3,545
1950	6,520[e]	3,000[e]	3,520
1951	7,277[e]	4,800[e]	2,477
1952	12,600[e]	9,000[e]	3,600[e]
1953	16,700[e]	12,000[e]	4,700[e]
1954	12,989[e]	9,600[e]	3,389[e]
1955	12,900	8,400[e]	4,500[e]

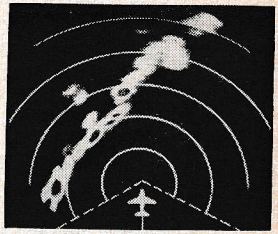
[a]Includes military aricraft for Lend-Lease shipments.
[b]Represents domestic civil production only.
[c]Includes United States-financed aircraft manufactured in Canada.
[d]No production except military.
[e]Estimate.



The sign that will seldom go on in flight!

The four fierce horsemen that shake the skies—Thunder, Rain, Lightning and Hail—have met their match in Bendix* Airborne Radar. Planes equipped with this wonderful new device can now safely avoid the turbulence and damage storms often cause. Even at night, Bendix radar sees storms up to 150-miles range and projects a clear, detailed picture of their location, size and intensity on a scope in the cockpit so pilots can decide what to do—skirt the area or fly through it if the radar indicates a clear passageway.

If you are in a position to direct or influence the purchase of this equipment for airline or executive type planes, here are pertinent facts you should have: 1. Bendix radar has been flown millions of safe miles. 2. Bendix Radio Division is one of the true pioneers in precision electronics. 3. Our production ability and service facilities are second to none . . . vital reasons why we merit prime consideration as a source for aviation and other industrial electronics equipment. Contact the General Manager.



Actual storm ahead as pilot sees it on radar scope. It indicates that, by changing course very slightly to the right, he will find a smooth, storm-free route.

*Reg. U.S. Pat. Off.

Bendix RADIO

Bendix Radio Division • Bendix Aviation Corporation • Baltimore 4, Maryland

Export Sales and Service: Bendix International Division, 205 E. 42nd Street, New York 17, N. Y., U.S.A.

CIVIL AIRPLANE OUTPUT

By Power and Types

(Source: Bureau of the Census, Facts for Industry Series M42A)

1937-1955[1]

	1937	1938	1939	1940	1941	1945
Total	2,289	1,823	3,715	6,785	6,844	2,047
By number of engines						
Single-engine	2,171	1,770	3,613	6,562	6,629	1,946
Multi-engine	118	53	102	167	165	101
Unclassified	0	0	0	56	50	0
By horsepower						
50 hp. and under	1,393	1,350	1,686	490	7	0
51-70 hp.	44	23	1,349	4,529	4,303	1,828
71-100 hp.	183	61	311	935	1,805	105
101-165 hp.	193	149	120	211	206	13
166-225 hp.	47	16	9	318	309	0
226-300 hp.	199	122	86	37	15	0
301-600 hp.	142	54	76	72	31	28
601-800 hp.	88	48	78	137	118	63
	0	0	0	0	0	10
Unclassified	0	0	0	56	50	0
By types						
Landplanes:						
1-2-place	1,668	1,487	3,118	5,527	6,060	1,929
3-5-place	460	258	465	1,031	573	17
6-20-place	48	26	21	8	3	63
21-place and over	57	17	55	132	112	10
Seaplanes	41	26	51	18	16	0
Amphibians	15	10	5	3	30	28
Unclassified	0	0	0	0	66	50

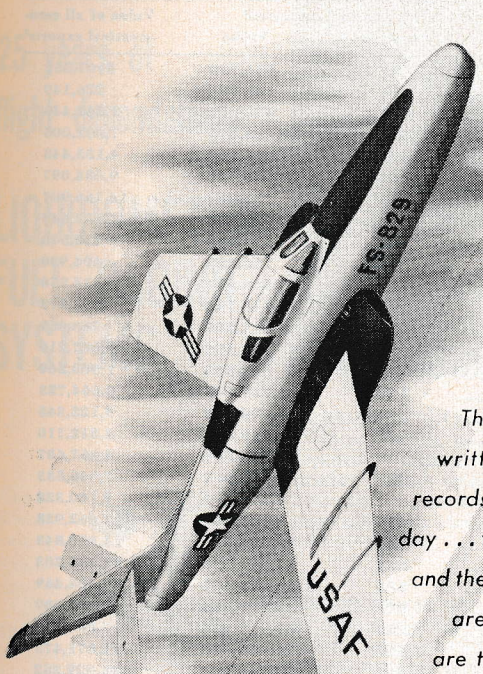
	1949	1950	1951	1952	1953	1954	1955
Total Civil	3,545	3,520	2,477	3,507	4,134	3,389	4,753
Personal	3,379	3,391	2,279	3,057	3,825	3,098	4,508
Transport	166	129	198	452	309	291	245
By Place:							
2-place	996	1,029	2,275	3,056	3,822	2,982	4,305
3- to 5-place	2,383	2,362					
Over 5-place	166	129	202	453	312	407	448
By Horsepower:[2]							
1-74	930	597	2,273	3,056	3,822	2,968	4,149
75-79							
100-399	2,440	2,789					
400-3,999	174	134	204	453	312	421	604
4,000 and over							

[1]1946 excluded.

[2]Exports excluded 1938-1941; no civil production during 1942-44; exports included 1945-50.

[3]Total rated horsepower of all engines.

TODAY'S PERFORMANCE
TOMORROW'S PROMISE



For nearly a generation such great fighter planes as REPUBLIC's Thunderbolt and Thunderjet have written their own imperishable records of combat superiority. Today . . . the F-84F Thunderstreak and the RF-84F Thunderflash, are on active service. Next in line are the F-103 and F-105. ✈ ✈ ✈ On drawing boards and in the experimental stage are other almost unbelievable new concepts of advance in aeronautical sciences. Whatever military missions tomorrow's Air Force fighter units are called upon to perform . . . you may depend upon Thunder-craft to be in the van.

REPUBLIC AVIATION

FARMINGDALE, LONG ISLAND, N. Y.

Designers and Builders of the Incomparable **THUNDER-CRAFT**

UNITED STATES AIRCRAFT EXPORTS

Number and Value

(Source: Aircraft Industries Association)

Year[1]	Aircraft exported[2] Number	Value	Value of all aeronautical exports[3]
1913	29	$81,750	$107,552
1914	34	188,924	226,149
1915	152	958,019	1,541,446
1916	269	2,158,395	7,002,005
1917	135	1,001,542	4,135,445
1918	20	206,120	9,084,097
1919	85	777,900	13,166,907
1920	65	598,274	1,152,649
1921	48	314,940	472,548
1922	37	156,630	494,930
1923	48	309,051	433,558
1924	59	412,738	798,273
1925	80	511,282	783,659
1926	50	303,149	1,027,210
1927	63	848,568	1,903,560
1928	162	1,759,653	3,664,723
1929	348	5,484,600	9,125,345
1930	321	4,819,669	8,818,110
1931	140	1,812,809	4,867,687
1932	280	4,358,967	7,946,533
1933	406	5,391,493	9,180,328
1934	490	8,195,484	17,662,938
1935	333	6,598,515	14,290,843
1936	527	11,601,893	23,143,203
1937	628	21,076,170	39,404,469
1938	875	37,977,324	68,227,689
1939	1,220	67,112,736	117,807,212
1940	3,522	196,260,556	311,871,473
1941	6,011	422,763,907	626,929,352
1942	10,448	879,994,628	1,357,345,366
1943	13,865	1,215,848,135	2,142,611,494
1944	16,544	1,589,800,893	2,825,927,362
1945	7,599	663,128,543	1,148,851,587
1946	2,302	65,257,749	115,320,235
1947	3,125	74,476,912	172,189,502
1948	2,259	66,354,000	153,629,000
1949	1,264[4]	37,388,553[4]	282,984,025
1950	759[5]	44,292,222[5]	242,362,699
1951	894[5]	18,606,528[5]	301,424,786
1952	1,180[5]	27,500,121[5]	603,181,876
1953	1,378[5]	91,137,326[5]	880,634,000
1954	1,151[5]	129,785,000[5]	619,384,000

[1]1913-18, fiscal years; 1919-54, calendar years. Data for the second half of 1918 is included with calendar year 1919.

[2]Exclusive of gliders and barrage balloons.

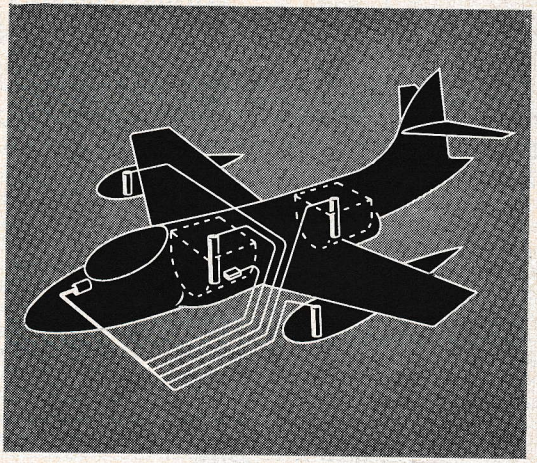
[3]Total value of aircraft, engines, parts, etc. 1913-21 include values of aircraft and aircraft parts. Prior to 1922, engine values were not reported separately, but were probably included with either "other" internal combustion engines or with "parts" of aircraft. Values for parachutes and their parts have been included only since 1932.

[4]For security reasons the 1949 figures do not include exports after April on military and cargo aircraft and engines of 400 hp and over. Right hand column includes military.

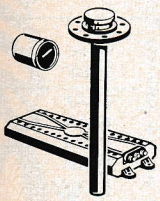
[5]For security reasons the 1950 figures do not include military, cargo and used transport aircraft, engines of 400 hp and over, propellers, instruments nor any other parts or accessories. Right hand column includes military.

25 years of flight dependability

LIQUIDOMETER FUEL GAGING SYSTEMS

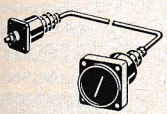


Liquidometer fuel gaging systems have operated for multi-millions of flight miles to provide pilots with accurate, dependable indication of tank contents. During over a quarter century association with the aviation industry, Liquidometer has developed an extensive range of basic gages and systems for a wide variety of liquid measuring and control functions.



CAPACITOR TYPE TRUE FUEL WEIGHT MEASURING SYSTEMS . . . to provide an indication of the true weight of fuel remaining. Unlike either uncompensated or compensated type gages, these systems measure density and volume *directly* rather than depending on the highly variable relationship between fuel density and its dielectric constant. Density measurements are made by an electric hydrometer known as the Liquidensitometer. For further information, write for Bulletin 522.

CENTER OF GRAVITY CONTROLS . . . to restrict center of gravity travel in today's heavily fuel-laden aircraft. Liquidometer has developed automatic fuel sequencing controls which are adaptable to a wide range of program patterns. For further details, see Bulletin 546.



POSITION INDICATING SYSTEMS . . . to show the position of flaps, trim tabs or other aircraft components Liquidometer also offers a wide range of position indicators and transmitters. Write for data sheets on these instruments.

LIQUIDOMETER INSTRUMENTS

THE LIQUIDOMETER CORP.

DEPT. S, SKILLMAN AVENUE AT 36TH STREET, LONG ISLAND CITY 1, N.Y.

Airline Statistics

AIRLINE REVENUE PASSENGER MILES

U. S. Domestic Air Carriers By Months

(Source: Air Transport Association)

	Millions of Passenger Miles							
Month	**1947**	**1948**	**1949**	**1950**	**1951**	**1952**	**1953**	**1954**
January	380,757	401,214	429,935	481,428	742,598	877,482	1,070,830	1,208,066
February	372,276	356,859	432,226	479,650	683,196	823,887	1,030,858	1,149,695
March	493,864	440,106	533,548	568,162	861,466	953,855	1,188,332	1,292,355
April	526,188	483,233	577,852	636,440	860,750	1,026,739	1,243,900	1,376,170
May	563,771	539,431	608,302	684,940	888,380	1,006,840	1,257,142	1,407,357
June	546,685	588,677	676,842	784,870	958,610	1,153,923	1,363,953	1,575,161
July	543,541	561,075	640,718	746,463	949,311	1,121,926	1,351,668	1,566,451
August	611,838	569,583	627,127	775,238	995,394	1,187,847	1,381,237	1,452,181
September	609,756	549,539	634,088	741,777	967,436	1,160,558	1,303,595	1,484,162
October	578,889	534,758	608,837	757,721	952,359	1,159,536	1,266,785	1,462,354
November	435,083	452,441	504,939	639,826	840,837	100,4,905	1,099,775	1,323,749
December	441,231	486,355	478,164	705,953	862,682	1,050,820	1,202,208	1,470,829
Total	6,103,879	5,963,271	6,752,578	8,002,468	10,563,019	12,528,318	14,760,283	16,768,530

AIR CARRIER OPERATING EXPENSES

Domestic

(Source: Air Transport Association)

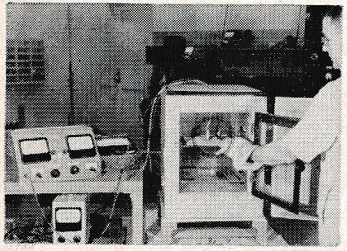
Year	Aircraft Operating Expenses	% of Total	Ground and Indirect Expenses	% of Total	Total Operating Expense
1944	45,150,125	36.26	79,371,967	63.74	124,522,092
1945	69,222,625	38.32	111,403,704	61.68	180,626,329
1946	129,645,346	40.24	192,573,836	59.76	322,219,182
1947	169,164,673	43.80	217,034,447	56.20	386,199,120
1948	199,990,706	46.33	231,643,571	53.67	431,634,277
1949	223,193,168	48.34	238,539,727	51.66	461,732,895
1950	228,503,346	48.18	245,797,635	51.82	474,300,981
1951	287,157,305	48.37	306,559,357	51.63	593,716,662
1952	360,862,000	49.96	361,500,000	50.04	722,362,000
1953	436,906,000	51.50	411,467,000	48.50	848,373,000
1954	485,874,000	51.75	453,070,000	48.25	938,944,000

BREAKDOWN OF DIRECT AIRCRAFT OPERATING EXPENSES

	Flying Operations	% of Total	Direct Maintenance Flight Equip.	% of Total	Depreciation Flight Equip.	% of Total
1944	28,238,316	22.68	11,892,963	9.55	5,018,846	4.03
1945	43,421,033	24.04	16,392,654	9.07	9,408,938	5.21
1946	70,805,391	21.98	33,272,916	10.33	25,567,039	7.93
1947	88,839,885	23.00	42,902,710	11.11	37,422,078	9.69
1948	109,636,528	25.40	49,034,659	11.36	41,319,519	9.57
1949	127,397,922	27.59	54,028,364	11.70	41,766,882	9.05
1950	131,086,952	27.64	55,768,177	11.76	41,648,217	8.78
1951	172,677,416	29.08	71,364,212	12.03	43,115,677	7.26
1952	208,404,000	28.85	92,483,000	12.80	59,975,000	8.31
1953	252,843,000	29.80	101,920,000	12.02	82,143,000	9.68
1954	279,389,000	29.76	109,758,000	11.69	96,727,000	10.30

Includes Trunks, Local Service and Territorial

Tester built to JAN specification provides shock of over 100G's. Contact reactions are indicated on special equipment.



Relays operating in especially constructed ovens are subjected to temperatures exceeding 400° Fahrenheit.

There's Nothing Like Experience

To Save You Money

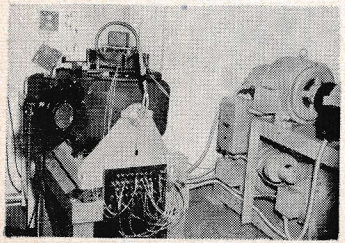
Potter and Brumfield with a quarter century of relay design and manufacturing experience gives you high quality at the lowest possible cost.

Many thousands of relays engineered for special applications to meet the highest possible quality levels.

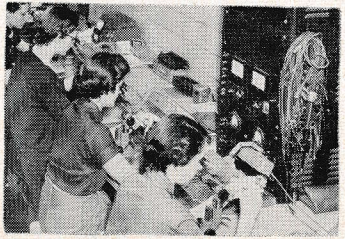
But still thousands of other designs built to meet highly competitive prices.

For quick delivery, over 350 different standard relays stocked by 500 Franchised Electronic Parts Distributors throughout the United States and Canada.

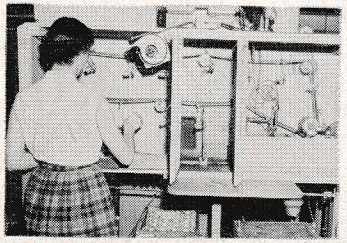
Potter & Brumfield
PRINCETON, INDIANA
SUBSIDIARY OF AMERICAN MACHINE AND FOUNDRY



Servo controlled shaker and rotary power supply located in sound-proof room has frequency range of 0 to 2,000 C.P.S.



Small watch size parts of P&B subminiature relays are inspected and assembled under ten power magnification.



All sealed relays are thoroughly cleaned of dirt, solder flux and other contaminants by the ultrasonic cleaning process.

Some sealed relays have as many as 90 possible voltage breakdown points. This tester checks them automatically.

PASSENGER MILES, MAIL, EXPRESS AND FREIGHT TON-MILES

U. S. Domestic and American Flag Carriers

(Source: Air Transport Association)

Year	Total Passenger Miles (000)	Passenger Load Factor	Air Mail Ton Miles	Express Ton Miles	Freight Ton Miles
			DOMESTIC[1]:		
1942	1,417,526	72.21	21,166,024	5,258,551	.....
1943	1,634,135	88.00	36,068,309	11,901,793	.....
1944	2,264,495	89.38	51,145,402	17,702,932	.....
1945	3,362,456	88.12	65,100,133	22,196,852	1,350,048
1946	5,947,956	78.71	32,962,122	23,788,392	14,822,325
1947	6,103,879	65.12	33,089,696	28,766,659	35,911,554
1948	5,981,603	57.59	37,925,396	30,092,833	71,283,727
1949	6,744,425	57.78	41,418,156	27,773,669	95,057,219
1950	8,002,792	61.25	47,008,947	37,279,035	114,072,045
1951	10,566,139	67.87	63,848,335	41,268,219	102,356,646
1952	12,528,318	65.60	69,261,570	41,324,306	119,501,666
1953	14,760,283	63.43	72,783,329	43,470,633	134,459,089
1954	16,768,530	62.45	81,487,000	41,166,000	147,089,000
			INTERNATIONAL:		
1950	2,206,423	59.66	21,188,090	44,501,521	16,049,809
1951	2,599,915	59.98	21,970,111	44,512,759	68,566,689
1952	3,019,860	62.28	27,712,000	.....	72,627,275
1953	3,381,124	61.90	30,836,000	.....	74,643,683
1954	3,743,296	59.56	42,658,000	.....	82,101,000

[1] Includes Trunks, Local Service and Territorial Carriers.

U. S. AIR CARRIER OPERATING REVENUES

Domestic and International

(Source: Air Transport Association)

Year	Passenger Revenues	% of Total	Mail Revenues	% of Total	Express & Freight	% of Total	Other Revenues	% of Total	Total Revenues
				DOMESTIC:					
1944	116,440,690	72.36	33,317,399	20.70	8,306,288	5.16	2,863,848	1.78	160,928,225
1945	166,519,923	77.59	33,557,040	15.63	10,835,140	5.05	3,694,562	1.73	214,606,665
1946	275,593,712	86.88	21,953,759	6.92	13,620,295	4.29	6,037,245	1.91	317,205,011
1947	308,575,954	84.58	29,444,746	8.07	19,377,949	5.31	7,440,928	2.04	364,839,577
1948	343,289,730	79.05	59,309,343	13.66	24,372,395	5.61	7,323,916	1.68	434,295,384
1949	385,509,049	78.69	68,569,538	13.99	26,928,631	5.50	8,923,223	1.82	489,930,441
1950	443,852,000	79.66	63,772,233	11.45	35,109,399	6.30	14,428,708	2.59	557,162,340
1951	591,186,365	84.17	57,421,687	8.18	36,914,107	5.26	16,842,347	2.39	702,364,506
1952	695,456,000	85.16	57,854,000	7.09	42,828,000	5.24	20,501,000	2.51	816,639,000
1953	803,859,000	85.99	61,937,000	6.62	47,787,000	5.11	21,294,000	2.28	934,877,000
1954	905,777,000	87.11	62,603,000	6.02	49,800,000	4.80	21,493,000	2.07	1,039,783,000
	Domestic Lines include Trunks, Territorial and Local Service.								
				INTERNATIONAL:					
1950	156,427,209	58.85	68,348,283	25.71	20,620,858	7.75	20,448,009	7.69	265,844,359
1951	184,691,825	64.14	63,343,846	22.00	25,244,764	8.77	14,655,226	5.09	287,935,661
1952	212,458,000	67.46	61,720,000	19.60	26,817,000	8.52	13,923,000	4.42	314,918,000
1953	232,539,000	68.94	63,303,000	18.77	27,331,000	8.10	14,113,000	4.19	337,286,000
1954	254,233,000	70.85	58,882,000	16.41	29,681,000	8.27	16,052,000	4.47	358,848,000

Making 1955 a year to remember

In the swift advance of aviation, 1955 has been a year to remember.

The age of jet air travel was heralded with the purchase of fleets of new Boeing 707 and Douglas DC-8 airliners—all powered by efficient, dependable Pratt & Whitney Aircraft engines. Here again the design and development of first rank aircraft engines has made possible a tremendous forward step in aviation. As the jet age opens, Pratt & Whitney Aircraft engines will continue to power most of the world's large commercial aircraft, as well as first line American military airplanes.

Hamilton Standard made outstanding contributions in the propeller and jet equipment fields. The new "nose-mounted" propeller, to utilize efficiently the huge powers and forces of coming turboprop engines, is but one example. In 1955 Hamilton Standard jet equipment, such as air conditioning systems, fuel controls, starters, pumps and pneumatic valves, added to the performance and efficiency of 40 different aircraft types, including the jet transport. As in past years its propellers equipped more than 90% of all commercial transports.

Major increases in the commercial use of Sikorsky Aircraft's helicopters, as well as their wide military service, added to their recognition around the world as man's most versatile vehicle. Orders by New York Airways and Sabena Belgian Air Lines for fleets of big Sikorsky S-58s reflect the growth of scheduled passenger services. Use of S-55s by business and industry expanded steadily. One firm alone carried more than 5000 employees and technicians to and from their jobs each month.

With expanding research and development, and record peacetime production, United Aircraft Corporation looks forward to even greater years ahead in the continuing program of aviation.

UNITED AIRCRAFT CORPORATION

EAST HARTFORD, CONNECTICUT

Designers, developers and producers of Pratt & Whitney Aircraft turbojet and piston engines, Hamilton Standard propellers and aircraft equipment, and Sikorsky Aircraft helicopters for our armed forces and the finest airlines in the world.