

WEIGHT & BALANCE

Work Order: WO_7348

Date: March 21, 2024

E&E AVIATION

7884 EAGLE LANE HANGAR M6

SPRING, TX 77379

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Registration #: N998DM

Serial: TD-697

Make: BEECH

Model: D95A

hobbs: 27.5

tach:

Previous Weight Information

Aircraft Gross Weight: 4200.0

Previous Weight: 3007.8

Previous Arm: 83.28

Previous Moment: 250488.2

Date: February 20, 2023

Items Removed

Item	Part Number	Serial Number	<u>Weight</u>	Arm	Moment
DISPLAY	AURACLE		3.8	58.5	222.3
FUEL QUANTITY UNIT	AURACLE		1.5	56.5	84.8
AURACLE	SENSORS & PROBES		16.5	38.25	631.1
DAU L/H & R/H	AURACLE		2.4	58.5	140.4
Total of Items Removed			24.2		1078.6

Items Installed

Item	Part Number	Serial Number	<u>Weight</u>	Arm	Moment
960 TWIN	EDM		2.0	68.0	136.0
JPI (L/H & R/H)	DAU		3.6	58.5	210.6
HARNESS	SENSORS/PROBES		10.1	38.25	384.8
Total of Items Installed			15.7		731.4

New Aircraft

Empty Weight	Empty Weight CG	Moment	Useful Load
2999.3	83.4	250141.1	1200.7

FOR AIRCRAFT LOADING, SEE INSTRUCTIONS IN AIRCRAFT FLIGHT MANUAL

Computed By: RAYMOND VILLALBA

Certificate #:

Signed:

USEFUL LOAD WEIGHTS AND MOMENTS

BAGGAGE

CARGO

FUEL

WEIGHT	FORWARD	REAR	AHEAD OF SPAR	AFT OF SPAR
	ARM 31	ARM 150	ARM 108	ARM 145
	MOMENT/100			
10	3	15	11	15
20	6	30	22	29
30	9	45	32	44
40	12	60	43	58
50	16	75	54	73
60	19	90	65	87
70	22	105	76	102
80	25	120	86	116
90	28	135	97	131
100	31	150	108	145
110	34	165	119	160
120	37	180	130	174
130	40	195	140	189
140	43	210	151	203
150	47	225	162	218
160	50	240	173	232
170	53	255	184	247
180	56	270	194	261
190	59	285	205	276
200	62	300	216	290
210	65	315		305
220	68	330		319
230	71	345		334
240	74	360		348
250	78	375		363
260	81	390		377
270	84	405		392
280		420		406
290		435		421
300		450		435
310		465		450
320		480		464
330		495		479
340		510		493
350		525		508
360		540		522
370		555		537
380		570		551
390		585		566
400		600		580

GALLONS	WEIGHT	LEADING EDGE	AFT WING
		WING TANKS	TANKS
		ARM 75	ARM 93
MOMENT/100			
5	30	23	28
10	60	45	56
15	90	68	84
20	120	90	112
25	150	113	140
30	180	135	167
35	210	158	195
40	240	180	223
45	270	203	251
50	300	225	279
55	330	248	307
60	360	270	335
62	372	279	346
65	390	293	
70	420	315	
75	450	338	
80	480	360	

OIL

ARM 46		
GALLONS	WEIGHT	MOM/100
3.0	23	11

OCCUPANTS

WEIGHT	PILOT OR COPILOT	CENTER SEATS		FIFTH AND SIXTH SEATS
		FWD POSITION	AFT POSITION	
	ARM 85	ARM 121	ARM 136	ARM 150
MOMENT/100				
120	102	145	163	180
130	111	157	177	195
140	119	169	190	210
150	128	182	204	225
160	136	194	218	240
170	145	206	231	255
180	153	218	245	270
190	162	230	258	285
200	170	242	272	300

GROSS WEIGHT MOMENT LIMITS

<u>Gross Weight</u>	<u>Minimum Moment</u> <u>100</u>	<u>Maximum Moment</u> <u>100</u>	<u>Gross Weight</u>	<u>Minimum Moment</u> <u>100</u>	<u>Maximum Moment</u> <u>100</u>	<u>Gross Weight</u>	<u>Minimum Moment</u> <u>100</u>	<u>Maximum Moment</u> <u>100</u>
800	2100	2408	3300	2475	2838	3800	2920	3268
810	2108	2417	3310	2483	2847	3810	2931	3277
820	2115	2425	3320	2490	2855	3820	2942	3285
830	2123	2434	3330	2498	2864	3830	2953	3294
840	2130	2442	3340	2505	2872	3840	2964	3302
850	2138	2451	3350	2513	2881	3850	2976	3311
860	2145	2460	3360	2520	2890	3860	2987	3320
870	2153	2468	3370	2528	2898	3870	2998	3328
880	2160	2477	3380	2535	2907	3880	3010	3337
890	2168	2485	3390	2543	2915	3890	3021	3345
900	2175	2494	3400	2550	2924	3900	3032	3354
910	2183	2503	3410	2558	2933	3910	3044	3363
920	2190	2511	3420	2565	2941	3920	3055	3371
930	2198	2520	3430	2573	2950	3930	3066	3380
940	2205	2528	3440	2580	2958	3940	3078	3388
950	2213	2537	3450	2588	2967	3950	3089	3397
960	2220	2546	3460	2595	2976	3960	3101	3406
970	2228	2554	3470	2603	2984	3970	3112	3414
980	2235	2563	3480	2610	2993	3980	3124	3423
990	2243	2571	3490	2618	3001	3990	3135	3431
3000	2250	2580	3500	2625	3010	4000	3147	3440
3010	2258	2589	3510	2633	3019	4010	3158	3449
3020	2265	2597	3520	2640	3027	4020	3170	3457
3030	2273	2606	3530	2648	3036	4030	3181	3466
3040	2280	2614	3540	2655	3044	4040	3193	3474
3050	2288	2623	3550	2663	3053	4050	3205	3483
3060	2295	2632	3560	2670	3062	4060	3216	3492
3070	2303	2640	3570	2678	3070	4070	3228	3500
3080	2310	2649	3580	2685	3079	4080	3240	3509
3090	2318	2657	3590	2693	3087	4090	3251	3517
3100	2325	2666	3600	2700	3096	4100	3263	3526
3110	2333	2675	3610	2711	3105	4110	3275	3535
3120	2340	2683	3620	2722	3113	4120	3286	3543
3130	2348	2692	3630	2732	3122	4130	3298	3552
3140	2355	2700	3640	2743	3130	4140	3310	3560
3150	2363	2709	3650	2754	3139	4150	3322	3569
3160	2370	2718	3660	2765	3148	4160	3334	3578
3170	2378	2726	3670	2776	3156	4170	3345	3586
3180	2385	2735	3680	2787	3165	4180	3357	3595
3190	2393	2743	3690	2798	3173	4190	3369	3603
3200	2400	2752	3700	2809	3182	4200	3381	3612
3210	2408	2761	2710	2820	3191			
3220	2415	2769	3720	2828	3199			
3230	2423	2778	3730	2842	3208			
3240	2430	2786	3740	2853	3216			
3250	2438	2795	3750	2864	3225			
3260	2445	2804	3760	2875	3234			
3270	2453	2812	3770	2886	3242			
3280	2460	2821	3780	2897	3251			
3290	2468	2829	3790	2909	3259			

The above moment limits are based on the following weight and center of gravity limit data (landing gear down).

WEIGHT CONDITION

FORWARD CG LIMIT

AFT CG LIMIT

4200 lb. (Maximum take-off and landing)
3600 lb. or less

80.5
75.0

86.0
86.0