

624 048168 1.181 2963 Am

5771 00 56.3 -60 58 +7.2 Cope

GL1177

ROB 110

6.22 +0.10 (1.55)

GL +0.0051 +0.022 N30

+0.0078 +0.020 GL →

+0.0060 +0.021

+0.044

+008  
+020  
+006441  
+0261314

17.902 9.2 0026 0019

597 46

$-\frac{261}{641}$

$-\frac{21}{5944}$

✓

17.743

9183

5865

-39

$-\frac{8}{58723}$

709

5840

17.770

469

-33

$-\frac{37}{73}$

5923

R.A. : 0.950  
DEC. : -60.950  
R.A. : 76.000  
DEC. : 27.000  
ANCE : 6.120  
ULUS : 167  
VEL. : 7.200

(U) : 0.829  
(U) : 0.479  
(U) : -0.287  
dU : 206.432  
U : 32.511

(V) : -0.558  
(V) : 0.682  
(V) : -0.473  
dV : -10.267  
V : -5.124

1 (W) : 0.031  
2 (W) : -0.552  
3 (W) : -0.833  
dW : -65.251  
W : -16.928

35

NPS?

286 | 147 + 88 45

5914

(H)

6-42 + 12 + 14 ?

-10

2391-006

628-029

3574  
-24

new? 3348

500

70

646 62  
0-14

10-15

9782	9291	0731
-2076	-3698	2068

-10

(2.5)

12.24 18.90

20

A05 868

6130

2472

548

1 00.5

+60

48

-0007 ± 3.7

+009 ± 3.3

5.9 GA9 - 0.98

661263

0 31.008

1892.1

+60 48

24.46

1890.6

041

,049

9.0m displacement  
per cent

-53

23,93

58 58.97

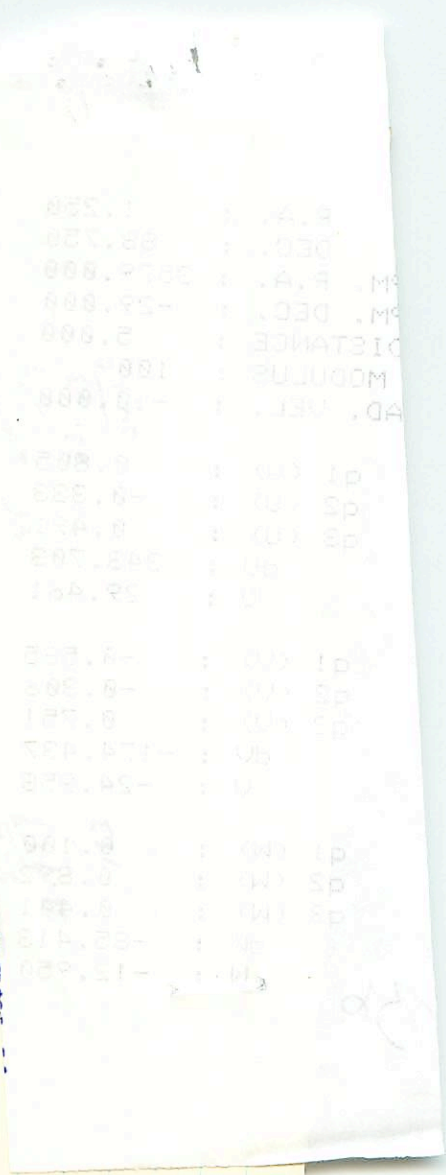
1 37.954

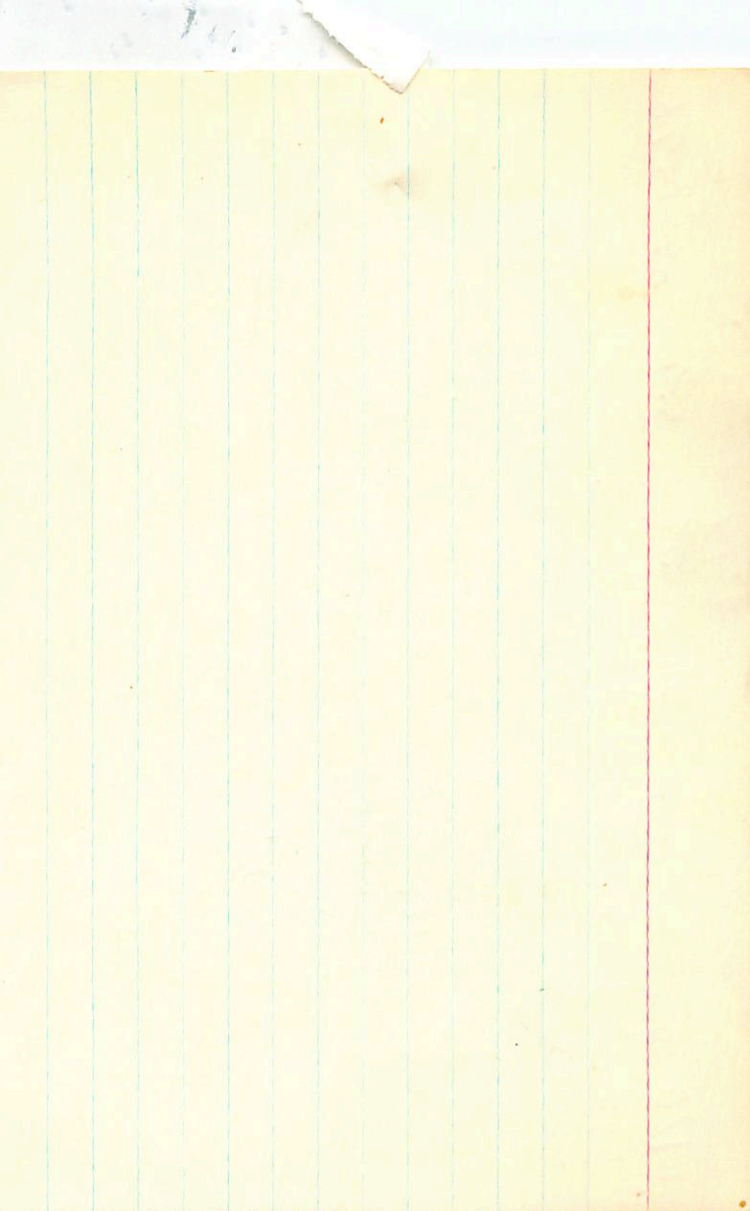
40 19.6

5 11.2

100

002 30.925





843  
619

1 000 31 49

845-088 1432

PINS

TOUCH 40170

030 144 1052 2.850

10821012

1109  
~~1234~~

97  
12  
net  
b

0004 545 1122 416 82/2



R.A. : 1.000  
DEC. : -31.800  
1. R.A. : 97.000  
1. DEC. : 12.000  
DISTANCE : 4.260  
MODULUS : 71  
D. VEL. : -8.000

q1 (U) : 0.826  
q2 (U) : 0.564  
q3 (U) : -0.008  
dU : 354.732  
U : 25.292

q1 (V) : -0.563  
q2 (V) : 0.822  
q3 (V) : -0.087  
dV : -173.047  
V : -11.612

q1 (W) : 0.043  
q2 (W) : -0.076  
q3 (W) : -0.996  
dW : 12.310  
W : 8.845

37

37

6314

1292

W613

305

47.139 006

10018-017

1 018 +39 43

6.77 200

<sup>120</sup>  
~~1120~~  
230

640  
650

2.735

+0064 ± 2.8 -020 ± 2.4 1.919 9814 9999 9999 9999 0262  
+00651 -019 -0124 -0160

24.43 943 P<sub>0</sub> = +8.7

+0751

+078-017

0764  
-0197

9814  
1919

9999  
-0124

+2.53

101  
-17

418

+11

38

R.A.	:	1.000
DEC.	:	39.700
M. R.A.	:	101.000
M. DEC.	:	-17.000
DISTANCE	:	4.180
MODULUS	:	69
AD. VEL.	:	11.000

q1 (U)	:	0.826
q2 (U)	:	0.186
q3 (U)	:	0.532
NP	:	289.113
U	:	25.675

q1 (V)	:	-0.563
q2 (V)	:	0.343
q3 (V)	:	0.752
NP	:	-234.866
V	:	-7.826

q1 (W)	:	0.043
q2 (W)	:	0.921
q3 (W)	:	-0.388
NP	:	-58.489
W	:	-8.281

38

102.38 - 32.23

309 103.2 + 6.2 30

14.39 0.66

6.716

Bib

6.51 + 0.22 + 0.55 2.54 -

→

+ 114 + 1.58 8.42 2.82 0.00 5.06

5150

396  
1238  
228  
1466

1492  
+ 210  
-----  
1702

40154-030  
101020  
New

652-018 1219

4.44

+ 11 SB (Aug 26. 1964)

231

230

E

0.016 6.45 4.44

9988

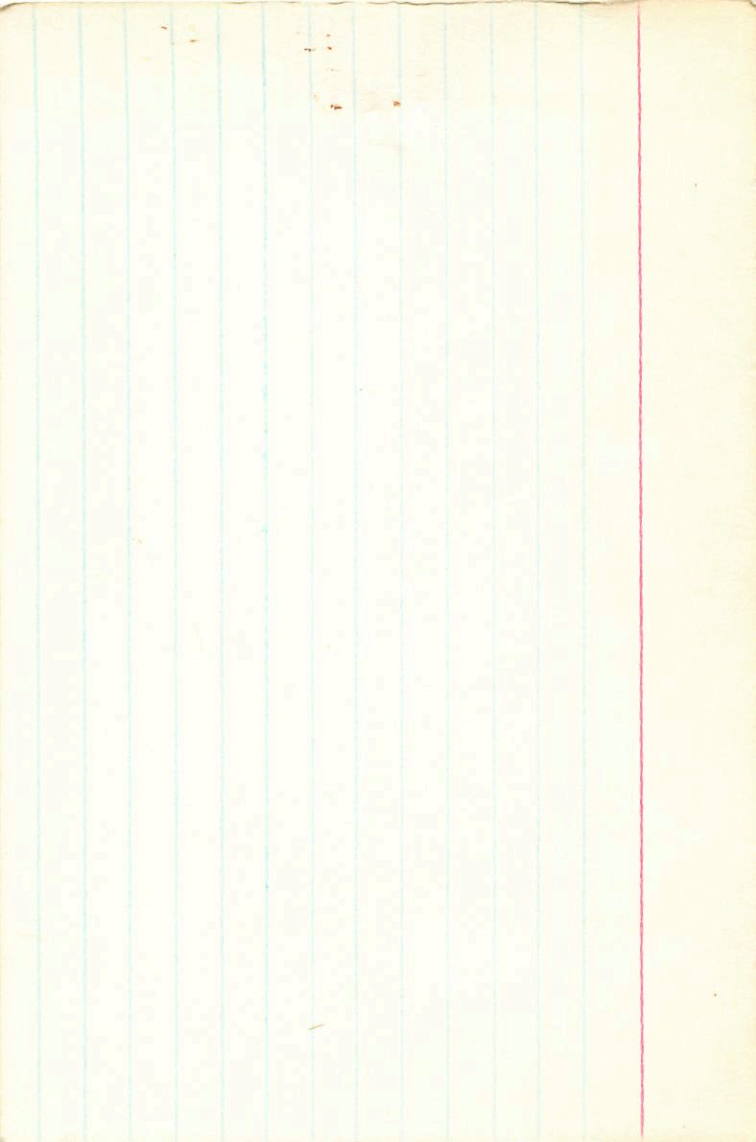
9774

1070

- 0.164

- 3740

1800



4610206

+0148 ± 40  
+0148

-014 ± 3.5  
-022

58(126)

6416 6416 / 03.2 + 62 30 A3 + 11C

W62Y 1316  
624

+0118 - 0205  
+0475 - 0195

+103 - 019 GC

HR309

GC

12.329  
- 589  
-----  
11,440

1889.9 + 62 29 40.90  
+1022<sup>016</sup> 1.17

1888.0  
+106 - 028 GC(2)

+105 - 023 GC  
GC(2)

46.0

42.07  
38.2 1425.7

+10 W(14)  
+10 W(13)  
50(170)

37.960  
23.730  
-----  
14.230  
+ 6  
-----  
12,120  
+ 6  
-----  
12,126

7182  
35.9

47.6

+107 - 023 A

12.250  
249  
-----  
1249

40.92 1946.12  
- 3  
50.89

9710 955 1094  
1771 045 - 0103  
-----  
1555 11480

186

272 562 557 Y62 +105 -023 +11 -020 +10 -052

-029 +005 001 -019 -047 8-02 +5.1 +5 +1

011

+1 +Y6 +5

[+Y2 -17 -Y]

012

+1 +Y3 +6

[+Y1 -15 -6]

1  
1.54.11M  
SYE  
1988Y2 282-1  
232  
814

944 2.7

915 25

908 282

+1.4  
+10.5



325

048 -24 16

Jan

6668

1357

6.36 +0.23 +0.10 1.84

+133 +228 +771 - 2555

6.37 132 241 814 2.830

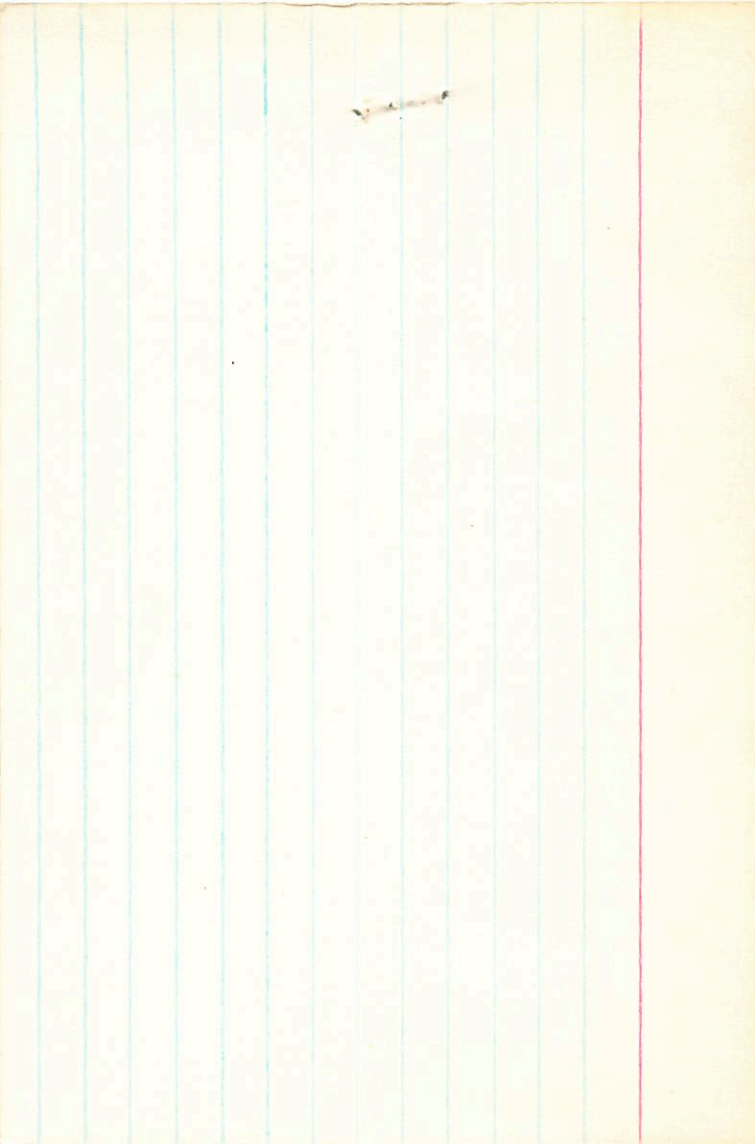
6.35 133 208 802 2.827 1,415,20,32

new

410  
1212  
212  
1475

395

+15 van



HR325

1 048 -24 16

6-36+0.24

A7D

"

7093 -033 G-L

7.52

DM

39

328

1 05.3

+20 28

70054 402

076 102

6695

1370

5.6

—

+13

+13

915

32

2863

+064 +188 +549 000 SPC

new

+0060 - 101 230

+084-101

-2

6102

-072

936

1324

376

25

13

128

453

186

a=81

n=10

204

207

183

+163 81

-102

3.76

-12.0

+ 5.6

+1.85

3.75

~~-9.3 15~~  
~~21 11 5~~  
~~-15~~

40

1.188	:	R.A.	1
20.128	:	...	2
81.088	:	R.A.	3
102.888	:	DEC.	4
2.788	:	STANCE	5
28	:	...	6
12.888	:	VEL.	7
8.818	:	(U)	11
8.844	:	(U)	12
8.881	:	(U)	13
127.888	:	UB	14
1.888	:	U	15
272.8	:	(U)	17
272.8	:	(U)	18
272.8	:	(U)	19
487.288	:	UB	20
888.48	:	U	21
888.8	:	(U)	22
147.8	:	(U)	23
888.8	:	(U)	24
888.488	:	UB	25
488.81	:	U	26

Op

R.A. : 1.100  
DEC. : 20.450  
R.A. : 81.000  
DEC. : -102.000  
DISTANCE : 3.760  
MODULUS : 56  
VEL. : -12.000

q1 (U) : 0.818  
q2 (U) : 0.344  
q3 (U) : 0.461  
dU : 127.869  
U : 1.687

q1 (V) : -0.572  
q2 (V) : 0.577  
q3 (V) : 0.583  
dV : -484.785  
V : -34.383

q1 (W) : 0.066  
q2 (W) : 0.741  
q3 (W) : -0.669  
dW : -334.368  
W : -10.864

60



11359  
AI 5ul

7312 1 10.5 -38 07 F0 II +17.4 4 legs

F0821

shch A9.12 +8

104

5.91 +0.29 (1.59)

Var  
80 h/m  
m

+0.0077 -0.026 N30

+0.0077 -0.030 GL →

+0.0077 -0.028

+0.041

+086-033  
P104

118 609

126 29

9966 9778

0827 2094

176 190 809 2751 2751 2751 2751 2751 2751

170 153 814 2.767



47

7312

1 10.5 -38 07

A7IV

HR359

B-6146 ✓

$5.91 + 0.29$  (405) C  
 $5.91$   
 $5.91 + 1.70 = 7.61$   
 $7.61 + 0.150 = 7.76$

2767

2.781 (2)

Sum  
gr

$1.62$   
 $1.62 + .209 = 1.829$   
 $1.829 + .029 = 1.858$   
 $1.858 + .027 = 1.885$

[m] 230

[C] 785

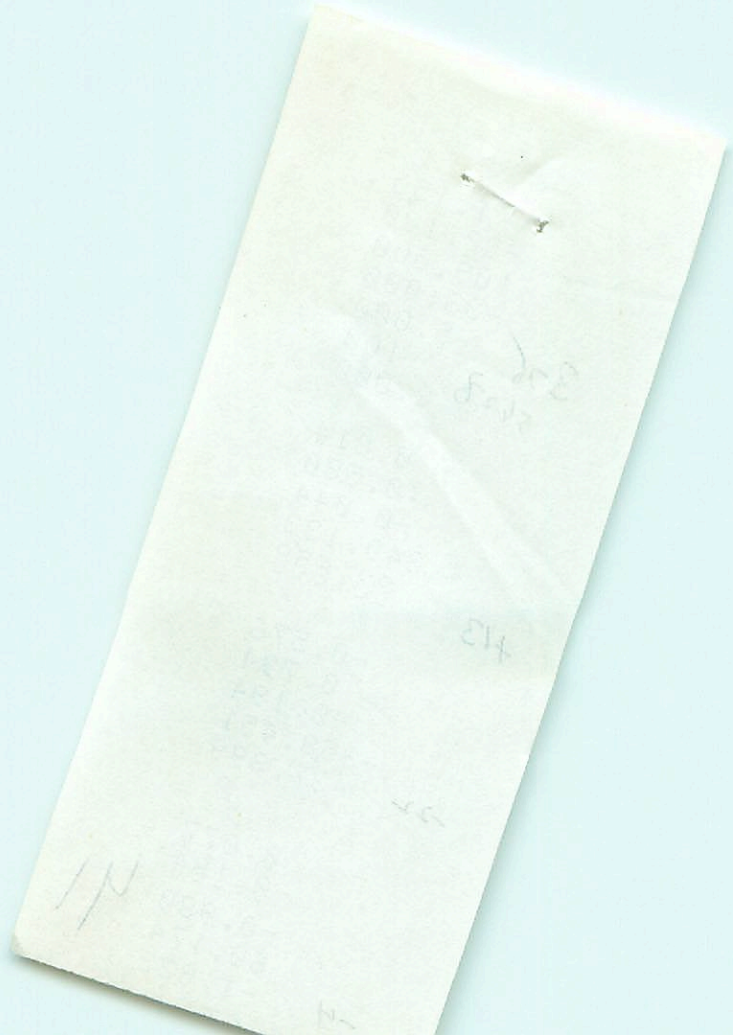
(58)

$+0.91$   
 $+12.0$   
 $-0.25$

5.00 +26.8 -32.7 -5.6

+3 -4 + 1 / 1000

3.40  
1.60  
1.80  
1.



~~1.150~~

- 38.100

109.000

- 33.000

375  
5628

5.000

100

8.000

0.814

0.580

- 0.844

240.133

+13

23.050

- 0.576

0.794

- 0.194

- 0.00.451

-22

- 0.7.399

0.877

- 0.184

- 0.980

0.174

-4

- 1.822

41

333

1 08.0 +79 25'

~~+0210 605~~ FK 5 11.36  
~~+0320 11547~~

6298

1420

new

0916 1147

3.54 +0.02 +002 1E99

498  
-5

4.36

+20

Strum?

9892  
14699857  
-17160910  
0114

+019

156

1051 2.911

JG

~~-011~~

189

~~1059~~ 2.608

etal

+004

180

1055 2.909

360  
1415

+10:

+03357

+0032 Chem

1419

a=15

164

-36

=8

a = 026

h

n = 25

1.2

+03321

+002

2 = 019

~~+1.3~~  
3.25
~~+1.22~~  
4.35

[m]

159

318

1.046

1.364  
35

4.299



42



R.A. : 1.150  
DEC. : 79.400  
R.A. : 498.000  
DEC. : -5.000  
DISTANCE : 4.360  
MODULUS : 74  
VEL. : 7.000

q1 (U) : 0.814  
q2 (U) : -0.228  
q3 (U) : 0.535  
dU : 358.710  
U : 30.457

q1 (V) : -0.576  
q2 (V) : -0.194  
q3 (V) : 0.794  
dV : -245.593  
V : -12.733

q1 (W) : 0.077  
q2 (W) : 0.954  
q3 (W) : 0.290  
dW : 10.987  
W : 2.846

47

5935089.36221  
1447477  
9280

ZC 234

+160  
+193  
ASm +3.2

+0.9

+17.11

33.2

144

151

816 3907  
+151 +0.1 0  
+150 +0.22 2-5

5.9  
148.194

148.194

148.194

148.194

12.80 942  
+10  
4290 4145  
~~148~~  
41.96

334

11.50  
11.94

14

+01046 +0022-1  
+01049 +00228  
+01047 +00146  
+01074 +0187  
+01051 +0232

9491 8488  
3149 0220

1563  
0150  
+4.15

0772  
383

166  
166

101

1594

1594

1594

1594

1594

12.00  
-12  
242

43.15

122

122

122

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

1594

395-918 296 555 +150 1022 +3. 007 +1 095  
 -059-003 138 006 -305 640 +3 +3 +1

$$-9 + 27 + 5$$

$$\boxed{+25 - 13 + 5}$$

0155  
025

(4)  
162  
140

151 143  
 112 127  
 236  
 236  
 125  
 13

3764

7439

719

AOS1003

5.1 } 50<sup>M</sup>  
7.0 } physics

5.2

1 11.9 -08 11 dF2 +2208

+121 +22866

GC  
1491

+0084 +276 N30

+0083 +276 ~~514~~ GC cont N30

√855

1511

99  
84

396  
7926

83  
21  
12

+0082 +277 F124

781  
~~695~~

+121

**+123+273**

258 162 442  
139 553

2448

309 951 -143 550 +121 1279 +22.0 -040 -3 1.305  
-037 012, 115-038 0 602 +215 +21+7

+22 +31

025-

MB



7439.000\*

1.000\*

11.900\*

-8.000\*

-11.000\*

0.123\*

0.273\*

1.750\*

25.1

22.387

22.000

1.153

0.261

35

31.543

H0366

7789

0767

ASS

1603 ASS

4 153

1 11.9 -0.8 11

5.2 d12

7.9 AG7

+21.0

+18

+20.0



CEI

511 900

5888

5888

7788

115

1

14:1

-69 08

5.1 F2m

+9.28

735

42+8

W 11/11

9600

94

$\rho = 86.2$

2.18

+44

2x fine

1415

1234

1535 B

+758 +113

N30

1536 A

+771 +110

+0765 ± 3.5 +111 ± 3.3

111.9 127M3

765 1125

4894

40788 1177

486 0.380

0.190 0.480 2.660

420

4056

407.5 + 113.5

275

280 420

Sum AB =

017

245

245

450

+

+ 13.55

1234

567

440 416

9445

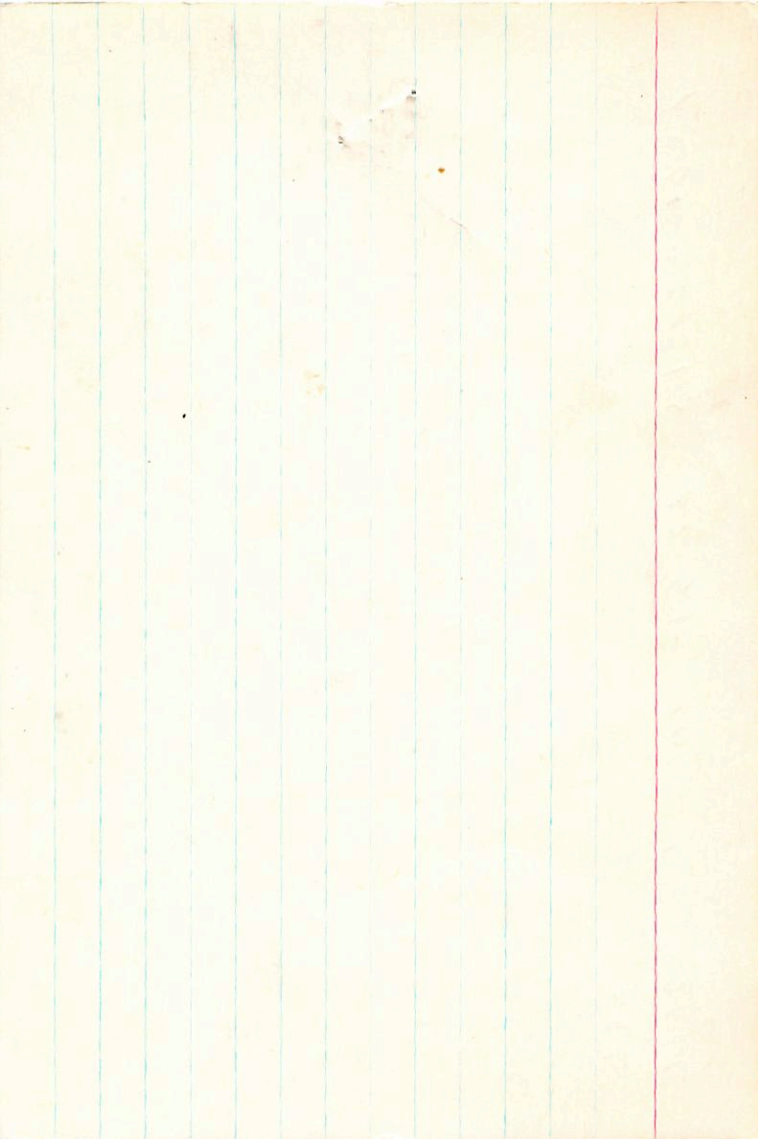
9623 / 4303

608 304

3284

272 / 0107

Σ 00 = 218



14 Tue  
~~7672~~

397

$\rho = +4 \pm 2.5$  2 Cyl  
44.9349

14.1 - 69 05 F2m +9.28  
4.87 +0.44 R6R  
+44.4

7285

44.4  
A  
B

CO 2.20 +0.93  
0.20 ± 0.5

+399 +112 R  
+411 +111 N  
+405 +111

(NO)

80  $\Delta m = 0.5 \text{ my}$

495 312 168

262  
168

287  
444

2650  
407.5 +113.5

220

405 112  
407 +109

01

136

998  
443

97 B  
237A

448  
OR

$P_c = 1.8$   
0454  
1.71

122

1458

BL 725 1683.2  
561 440 445 304  
608 209 254

0.92

5998  
968.8  
2453

4228  
+0.004  
P.V. +4.0 411

(3)

318 948 734 357 + 405 + 111 + 9.2 104 + 9 190

8185

6488

6576

-129 -033 354 095 -1.050 1.463 +33 +3 +1

608  
x10

-24 +43 +14

04

AK 485 2.312 105 44 255

+43 -20 +21

045

1.86 301 190 780 2.175

-21 +35 +13  
+37 -16 +15

(250) (250)

9962 9644  
0275 2453

two -15 +10

10425

-15

05

-14 +29 +12

+31 -11 84

06

R.A. : 1.250  
 DEC. : -62.100  
 PM. R.A. : 1141.000  
 PM. DEC. : 114.000  
 DISTANCE : 1.250  
 MODULUS : 20  
 RAD. VEL. : 6.000

p1 (U) : 0.800  
 p2 (U) : 0.494  
 p3 (U) : -0.328  
 q1 : 1812.812  
 q2 : 34.388  
 U :

p1 (V) : -0.282  
 p2 (V) : 0.260  
 p3 (V) : -0.28  
 q1 : -822.34  
 q2 : -12.82  
 V :

p1 (W) : 0.100  
 p2 (W) : -0.66  
 p3 (W) : -0.74

R.A. : 1.250  
DEC. : -69.100  
PM. R.A. : 1141.000  
PM. DEC. : 114.000  
DISTANCE : 1.500  
MODULUS : 20  
RAD. VEL. : 6.000

q1 (U) : 0.805  
q2 (U) : 0.494  
q3 (U) : -0.329  
dU : 1819.812  
U : 34.336

2633

q1 (V) : -0.585  
q2 (V) : 0.566  
q3 (V) : -0.58  
dV : -822.346  
V : -19.893

261

q1 (W) : 0.100  
q2 (W) : -0.661  
q3 (W) : -0.745

400  
9896

33.4

-58 23.8

61

F2E

Bonus  
+190.50.3

1937

+0356H -024" N30

+0361±4.9 -031±3.5 6-L → N30

9 +15.0?

Cap +21.7  
4/12

3440.

350

1799

30

Bill

1250 -030

+20.2 hours

974 600 -198

+1.0272 -0853

49419

+36.7 -4.0

+32.7

-608 623 291

-8069 -0886

~~4.125~~

-8955 -34.9 -10.0

-44.9

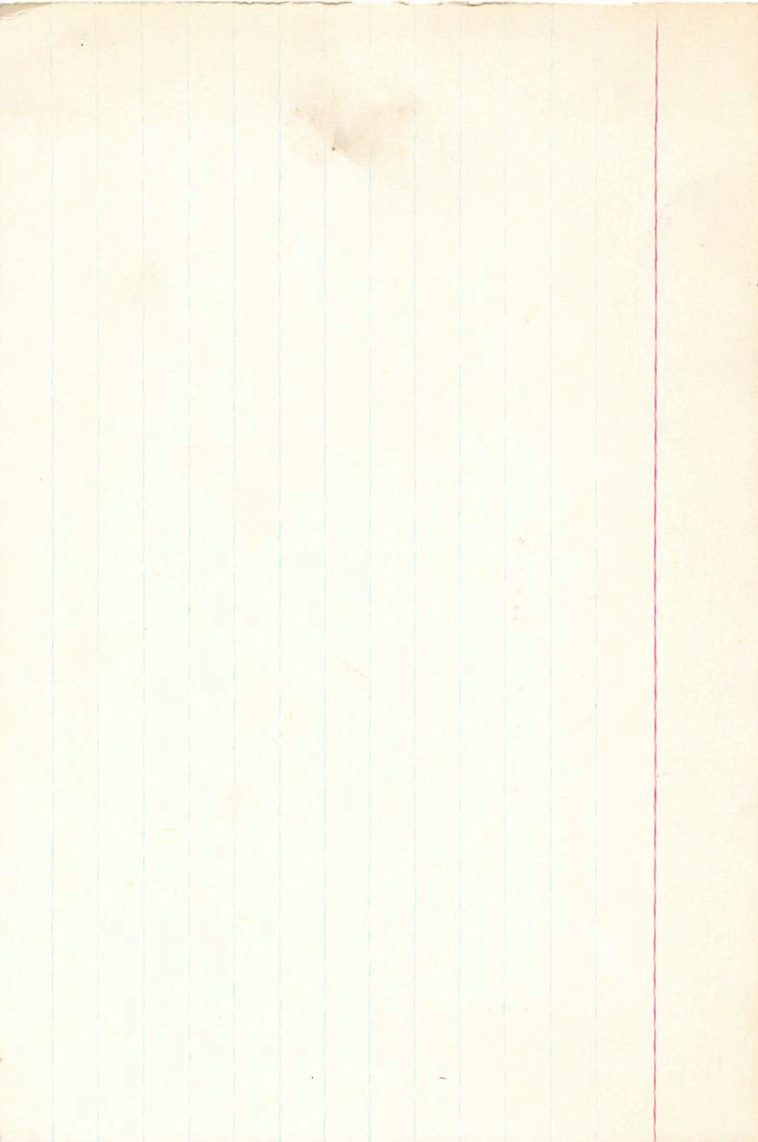
171 -500 -848

+1.2270 +0711

+2981

+11.6 -17.2

+5.6





F2E

356

-19.0

24

-58

33.4

1

9896

468  
25.159 5.4 2.086 6.00 +0.39 (1.56) Cape

+3.60  
+3.24

+0356 -029 N30  
+0341 -037 06 →

601172 897

+0357 -030

7.290

0360 -035

283 -035

+343

570  
-35

2.58

2.58

2.17

R.A. : 1.550  
DEC. : -58.400  
R.A. : 540.000  
DEC. : -35.000  
DISTANCE : 2.580  
DULUS : 33  
VEL. : 21.700

1 (U) : 0.775  
2 (U) : 0.599  
3 (U) : -0.199  
dU : 940.605  
U : 26.541

3464

1 (V) : -0.608  
2 (V) : 0.624  
3 (V) : -0.490  
dV : -919.386  
V : -40.800

-21.7

1 (W) : 0.169  
2 (W) : -0.501  
3 (W) : -0.849  
dW : 310.336  
W : -8.233

46

46

+1.01  
+135

Nyaly

1 37.7 +43 03

476

10204

2026

17

101  
10204

101  
10204

101  
10204

Bud 51

5.62 +0.21 +0.12 2555

+116 +201 +578 2000 SPG

955 24811

5.64 0.10 1.314

+170

10595039

104-039

142  
-39

142  
+17

9834

5016

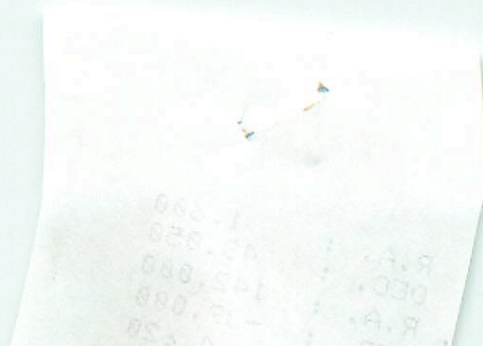
9911

-1331

1082

-0206

47



R.A.  
DEC.  
R.A.

..  
..  
..

1.600  
43.050  
142.000  
-39.000  
1.620

10204 201 875 2811  
135 930 952 772  
+0115 ± 4.2 -034 ± 2.9 70045 -029 488  
+0106 -030  
+43.03 9494 11248  
-036

HR476 2026  
2016 29.156  
39.198 1597.9 ± 43  
+0107 -033  
+126 -034 G  
+120 -040 G(2)

W934  
420341 -549  
34289 4333  
+2 255  
1.70  
45.64  
+1076 -030 284  
+1179  
+118 -033  
+119 -033 28.6

ADW 2024 38.599  
9.33  
29.475  
38.803  
38.125  
925  
925  
+326  
A1105 -032  
11187 -024 449  
30.7  
71.5 1927.5  
32.65  
45.70  
44.51  
44.27  
44.76  
-86  
28.5

9534 9911  
3016-1331  
1215  
0170-64 0133 4.33  
+1219 167 45.07  
+122-033 44.83  
1529.6  
M.29

413 911 682 230 +128 -038 +12.4 -026+12 -133

-051-069 113-024 -128 588 +12.7 +12.5

∴

+3 +44 +3

015

[+40-16-8]

+3 +45 +3

14.5

+41-17-4

28





1.600  
43.050  
167.000  
-33.000  
4.290  
72.07  
17.400

0.770  
0.069  
0.634  
434.611  
42.375

-0.612  
0.362  
0.703  
-410.513  
-17.364

48

0.181  
0.930  
-0.211

-24.16 F. 100

60 25 A and 33.9 + 41 09 260 - 28.1 a

17R 458 4.08 + 0.54 + 0.06 AFE

98261 175 - 378 6c

900 171 - 379 030

1948

422 - 39 - 33 719

-0151 - 379 N30

-0155 ± 1.5 - 377 ± 1.3 Geom t N30 W80

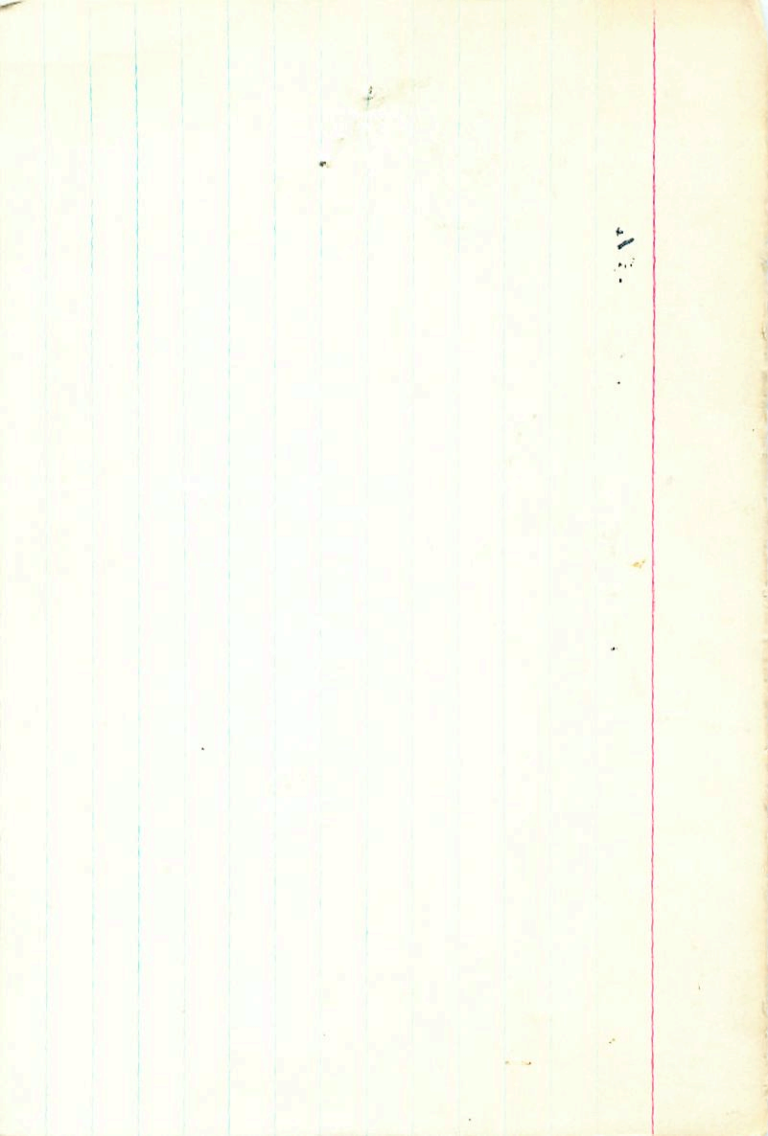
-220

-1488 - 329

1995 - 384

0.58 - 28.6

1466 = -146 - 379



F8D

1 33.9 441 09

9826

HR458

GC1448

4.09 + 53 + 06 (3)  
 (244) (440)  
 142 509

50 Prod

N39 .346 .177 .410 (25) SPC

2.624 Star F+  
 A.638 G.

342 ~~273~~ 402

[LAJ] 239 + 12

+13.5  
 -11.5

763

3793

F1Y

[GJ] 341 + 48  
 6.0

-01527  
 2290

-40  
 8833

(10.4)

+2  
 -1727

-1727  
 -1727-8833

-28.16

112  
 48  
 66

$$\begin{array}{r} 753 \\ 229 \\ \hline 624 \\ 6296 \\ 1506 \\ 1506 \\ \hline 19243 \end{array}$$

49

R.A.	:	1.250
DEC.	:	88.750
PM. R.A.	:	3579.000
PM. DEC.	:	-29.000
DISTANCE	:	5.000
MODULUS	:	100
AD. VEL.	:	-10.000

q1 (U)	:	0.805
q2 (U)	:	-0.333
q3 (U)	:	0.491
dU	:	343.703
U	:	29.461

q1 (V)	:	-0.585
q2 (V)	:	-0.306
q3 (V)	:	0.751
dV	:	-174.437
V	:	-24.958

q1 (W)	:	0.100
q2 (W)	:	0.892
q3 (W)	:	0.441
dW	:	-85.413
W	:	-12.950

30

Blank paper fragment

Handwritten: 49

DESCRIPTION	AMOUNT	DATE
RMD. MODULUS	137.28	12/15
RM. DISTANCE	138.00	12/15
RM. DEC. A.	138.00	12/15
RM. DEC. B.	138.00	12/15
RM. DEC. C.	138.00	12/15
RM. DEC. D.	138.00	12/15
RM. DEC. E.	138.00	12/15
RM. DEC. F.	138.00	12/15
RM. DEC. G.	138.00	12/15
RM. DEC. H.	138.00	12/15
RM. DEC. I.	138.00	12/15
RM. DEC. J.	138.00	12/15
RM. DEC. K.	138.00	12/15
RM. DEC. L.	138.00	12/15
RM. DEC. M.	138.00	12/15
RM. DEC. N.	138.00	12/15
RM. DEC. O.	138.00	12/15
RM. DEC. P.	138.00	12/15
RM. DEC. Q.	138.00	12/15
RM. DEC. R.	138.00	12/15
RM. DEC. S.	138.00	12/15
RM. DEC. T.	138.00	12/15
RM. DEC. U.	138.00	12/15
RM. DEC. V.	138.00	12/15
RM. DEC. W.	138.00	12/15
RM. DEC. X.	138.00	12/15
RM. DEC. Y.	138.00	12/15
RM. DEC. Z.	138.00	12/15



-0.000  
 0.626  
 -23.185  
 -0.195  
 0.695  
 -22.112  
 -1.818  
 -0.353  
 -13.948

49

R.A. : : : : 1.550  
 DEC. : : : : 41.150  
 R.A. : : : : -220.000  
 DEC. : : : : -379.000  
 DISTANCE : : : : 0.000  
 MODULUS : : : : 0.580  
 RAD. VEL. : : : : -28.600  
 13

q1 (U) : : : : 0.775  
 q2 (U) : : : : 0.097  
 q3 (U) : : : : 0.624  
 NP : : : : -782.958  
 N : : : : -28.072  
 U : : : : -0.6

q1 (U) : : : :  
 q2 (U) : : : :  
 q3 (U) : : : :  
 NP : : : :  
 N : : : :  
 U : : : :

-0007 E3.1 +009 E3.3

A05 868

6130 247 | 00.5 +60 48 5.9 GA9 -0.96

598

R61263 0 31.008 1992.1 +60 48 24.46 1890.6

$$\begin{array}{r} -53 \\ \hline 23,93 \end{array}$$

q. no. 11  
Hypocenters  
and  
epicenters

58 58.97  
1 37.958  
00 ~~30.925~~  
$$\begin{array}{r} 232 \\ \hline 37.151 \\ \hline 153 \\ \hline .104 \end{array}$$

40 19.6  
8 4.62  
48 ~~24.417~~  
$$\begin{array}{r} 23.33 \\ \hline 24.11 \end{array}$$
  
1927.8

