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EVALUATION OF NEUTRON NUCLEAR DATA OF ^{6}Li FOR JENDL-3

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Evaluation of Neutron Nuclear Data of ^{6}Li for JENDL-3

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Neutron nuclear data of ^{6}Li have been evaluated for JENDL-3 in the energy range from 10^{-5} eV to 20 MeV. Evaluated quantities are the total, elastic and inelastic scattering, radiative capture, photon-production, (n,2n), (n,p) and (n,α) reaction cross sections and the angular and energy distributions of secondary neutrons. The total, elastic scattering and (n,α) cross sections below 1 MeV have been calculated on the basis of the R-matrix theory. Two discrete levels were taken into account for the inelastic scattering. The double-differential cross sections for the (n,2n) reaction and the inelastic scattering to the continuous levels were obtained from the phase-space model calculations.

Keywords: Evaluation, Neutron Nuclear Data, Lithium-6, Cross Section, JENDL-3, R-matrix Theory, Phase-space Model, 10^{-5} eV ∿ 20 MeV

JENDL－3のための^{6}Liの中性子核データの評価

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（1984年10月13日受理）

JENDL－3のために^{6}Liの中性子核データを10^{-5}eVから20 MeVのエネルギー範囲で評価した。評価した量は全断面積，弾性散乱断面積，非弾性散乱断面積，放射性捕獲断面積，光子生成断面積，（n，2n）反応断面積，（n，p）反応断面積，（n，α）反応断面積，2次中性子の角度分布およびエネルギー分布である。1 MeV以下の全断面積，弾性散乱断面積および（n，α）反応断面積はR－行列理論により計算された。非弾性散乱では2本の離散準位を考慮した。（n，2n）反応および連続準位への非弾性散乱の2重微分断面積は位相空間模型により計算した。

Contents

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1. Introduction

Neutron nuclear data of ^{6}Li are important for fusion neutronics calculations. In particular the ^{6}Li(n,α)t reaction cross section as well as the ^{7}Li(n,n')αt reaction cross section controls the tritium-production rate in fusion blankets. The ^{6}Li(n,α) reaction cross section is also used as the standard. Although the data of ^{6}Li are included in the second version of Japanese Evaluated Nuclear Data Library (JENDL-2), which was released in December 1982, there remain the following problems in them:

1) The total cross section is considerably smaller than recent experimental data above 6 MeV. (about 15% at 14 MeV)
2) The elastic scattering cross section is also underestimated above 6 MeV. (about 20% at 14 MeV)
3) For the inelastic scattering, only the second excited level was taken into account as a discrete level.

In fact the ^{6}Li data in JENDL-2 are essentially the same as those in JENDL-1 which was released in autumn 1977. In the JENDL-1 evaluation, the elastic scattering and (n,α) cross sections were calculated by Komoda and Igarasi[1] with the Kapur-Peierls formula[2]. The underestimation of the elastic scattering cross section comes from the fact that there were few experimental data above 6 MeV at the time of the JENDL-1 evaluation. Consequently the total cross section which was given by a sum of partial cross sections was inevitably underestimated. Thus we decided to re-evaluate the data of ^{6}Li in order to resolve the above problems.

This report describes the procedure and the results of the re-evaluation. The presently evaluated data are compiled in the ENDF/B-V format, and they are listed in Appendix.

2. Total Cross Section

The total cross section of ^{6}Li has been measured by many groups. The measurements after 1970 are the following:

Foster, Jr. and Glasgow[3]	(1971),	2.5 MeV ∿ 15 MeV,
Meadows and Whalen[4]	(1972),	0.1 MeV ∿ 1.5 MeV,
Goulding and Stoler[5]	(1972),	0.5 MeV ∿ 30 MeV,
Harvey and Hill[6]	(1975),	10 eV ∿ 10 MeV,
Knitter et al.[7]	(1977),	80 keV ∿ 3 MeV,
Smith et al.[8]	(1977),	100 keV ∿ 400 keV,
Lamaze et al.[9]	(1979),	3 MeV ∿ 50 MeV,
Guenther et al.[10]	(1980),	0.5 MeV ∿ 4.75 MeV.

As to the $P_{5/2}$ resonance around 250 keV, Smith et al.[8] measured the energy and magnitude of the peak precisely with a vernier technique. Their values are the following:

11.20 ± 0.20 barns at 244.5 ± 1.0 keV.

In the present evaluation the energy range of the total cross section was divided into two regions, and different methods of evaluation were employed in each energy region.

Below 1 MeV, the cross section was calculated with the R-matrix theory[11] by using the computer code RESCAL[12] which was used in the evaluation[13] of ^{12}C. Two channels were taken into account in the calculation, that is, the elastic scattering and the (n,α) reaction. The R-matrix parameters were obtained so as to give the best fit to available experimental data. As for the $P_{5/2}$ resonance, the following experimental data were considered for the fitting:

total cross section	Smith et al.[8]
elastic scattering cross section	Knitter et al.[7]
(n,α) reaction cross section	Macklin et al.[14]

The final values of parameters are listed in Table 1. We took account of a positive-parity state of $J^{\pi} = 3/2^{+}$, which has not been observed[15], in order to reproduce the 1/v-behavior of the (n,α) cross section in lower energy regions. The total cross section was corrected by adding the (n,γ) cross section described in Sect. 6, because the (n,γ) reaction was not considered in the calculation. The energy and magnitude of the 250 keV resonance together with those of other evaluated data are listed as follows:

Present work	243 keV	11.2003 barns
JENDL-2	247 keV	11.2304 barns
ENDF/B-V	245 keV	11.2630 barns
ENDF/B-IV	244 keV	10.8630 barns.

It is found that ENDF/B-IV gives somewhat smaller value of the peak cross section than the other evaluated data.

Above 1 MeV, the evaluated data were obtained from a least-squares fit to the experimental data of Knitter et al.[7], Lamaze et al.[9] and Guenther et al.[10] This operation was performed by using Neutron Data Evaluation System (NDES)[16].

The present results are shown in Figs. 1-3 by comparing with experimental data and other evaluated data. As seen in Figs. 2 and 3, the JENDL-2 data gradually deviate from experimental data. The present evaluation has definitely excluded this drawback.

3. Elastic Scattering

As described previously, the elastic scattering cross section was calculated with the R-matrix theory below 1 MeV. Concerning the thermal cross section, Mughabghab et al.[17] recommended a value of 750 ± 20 mb. In the present calculation we obtained a value of 734.93 mb, and it is

in good agreement with the above value. Above 1 MeV the elastic scattering cross section was given by the difference between the total and reaction cross sections.

Figures 4 and 5 show the evaluated cross sections. Above 6 MeV the data of JENDL-2 are smaller than the recent experimental data[18,19], whereas those of ENDF/B-V are larger.

The elastic angular distributions were calculated with the R-matrix theory below 500 keV, and the results are shown in Fig. 6 around the 250 keV resonance. It is found that the calculation redroduces well the measured distribution. Between 500 keV and 14 MeV, the Legendre coefficients were obtained from the following experimental data:

500 keV ∿ 3 MeV	Knitter et al.[7]	(1977)
4 MeV ∿ 7.5 MeV	Knox et al.[20]	(1979)
7.5 MeV ∿ 14 MeV	Hogue et al.[18]	(1979).

Above 14 MeV where no experimental data are available, the distribution was calculated with the spherical optical model by using the computer code ELIESE-3[21]. As the optical potential parameters we used those of Agee and Rosen[22], and they are given as follows:

$$V = 49.3 - 0.33 \times E_{CM} \quad \text{(MeV)}$$

$$W_s = 5.75 \quad \text{(MeV)}$$

$$V_{so} = 5.5 \quad \text{(MeV)}$$

$$r_0 = r_s = r_{so} = 1.25 \quad \text{(fm)}$$

$$a = a_{so} = 0.65 \quad \text{(fm)}$$

$$b = 0.70 \quad \text{(fm)}$$

4. Inelastic Scattering

4.1 First Level (2.185 MeV)

In JENDL-2 the data on the inelastic scattering to the first

excited level of ^{6}Li, which decays through the process $^6Li^* \rightarrow \alpha + d$, are not included, because the contribution is included in the (n,n')αd reaction (MT = 91). From the viewpoint of neutron transport calculations, however, it is desirable to treat this level as a discrete level. Thus, we evaluated the data on the basis of the recent experimental data with the eye-guide method by using NDES[16]. The experimental data used for the evaluation are the following:

Hogue et al.[18]	(1979),	7 MeV ∿ 14 MeV,
Guenther et al.[10]	(1980),	3.5 MeV ∿ 4.0 MeV,
Lisowski et al.[19]	(1980),	5.96 MeV, 9.83 MeV,
Förtsch et al.[23]	(1981),	7.75 MeV,
Drake[24]	(1981),	14 MeV.

The evaluated result is shown in Fig. 7.

The angular distribution was estimated from the experimental data of Hogue et al.[18] and of Hopkins et al.[25]

4.2 Second Level (3.562 MeV)

The second excited level ($J^\pi = 0^+$) decays by emitting γ-rays which have isotropic angular distributions, and so the (n,n'γ) data were adopted in the evaluation. Presser et al.[26] measured the (n,n'γ) cross section in the energy range from 4.1 to 7.0 MeV. Above 7 MeV, only the 14 MeV datum of Besotosnyj et al.[27] is available. Hence, between the threshold energy and 7 MeV the evaluation was made by the spline-function fitting to the data of Presser et al.[26] Above 7 MeV, the eye-guide method was employed by taking account of the datum measured by Besotonsnyj et al.[27] The present result is shown in Fig. 8.

The angular distribution of neutrons, which has not been measured, was assumed to be isotropic in the center-of-mass system.

4.3 Continuous Levels

The (n,n')αd reaction cross section was measured by Rosen and Stewart[28] in the energy range from 5 to 14 MeV with a nuclear emulsion. This measured cross section naturally includes the contribution from the first excited level of ^{6}Li. Thus, the cross section to continuous levels was obtained by subtracting the (n,n_1) cross section from the (n,n')αd cross section evaluated on the basis of the data of Rosen and Stewart[28]. The angular and energy distributions were calculated with the three-body phase-space model. Details of the calculations are described in Sect. 10.

5. The (n,α) Reaction

As to the $P_{5/2}$ resonance, the peak magnitude was different among experimental data in the first half of 1970's. Friesenhahn et al.[29] gave the largest cross section to this resonance, while the data of Fort and Marquette[30], Coates et al.[31] and Poenitz[32], which were considered in the JENDL-2 evaluation, were consistent with one another. The recent experimental data[7,14,33], however, lie between the former and the latter data.

In the present evaluation, the (n,α) cross section was calculated with the R-matrix theory below 1 MeV, together with the total and elastic scattering cross sections. The calculated thermal cross section is 940.33 barns, and it is in good agreement the value of 940 ± 4 barns recommended by Mughabghab et al.[17] The peak values of the $P_{5/2}$ resonance are given as follows:

Present work	3.364	barns at 239 keV
JENDL-2	3.29481	barns at 243 KeV
ENDF/B-V	3.30870	barns at 240 keV
ENDF/B-IV	3.5130	barns at 240 keV.

It should be noted that ENDF/B-IV gives larger cross sections than the other evaluated data concerning the $P_{5/2}$ resonance.

In the MeV region, the experimental data of Bartle[34] and of Bartle et al.[35] are available. Thus, the evaluated cross section was obtained by a least-squares fit to them.

Figures 9 and 10 show the present results. As seen in Fig. 10, the 1/v-behavior of the (n,α) cross section in lower energy regions is reproduced fairly well by the R-matrix calculations.

6. Radiative Capture Reaction

As the thermal cross section we adopted the value of 38.5 mb which was recommended by Mughabghab et al.[17] The cross section was extrapolated as 1/v up to 100 keV, i.e.,

$$\sigma_{n,\gamma} = 6.12 \times 10^{-3} \, [E_n(\mathrm{eV})]^{-1/2} \text{ barns.}$$

Above 100 keV the inverse reaction data of Ferdinande et al.[36] were added by using the detailed balance. The result is shown in Fig. 11.

7. The (n,p) Reaction

Presser et al.[26] measured the (n,p) cross sections in the energy range from 3.1 MeV to 9.0 MeV with the activation method. Above 9 MeV several measurements[37-40] were performed at 14 MeV. The cross section was evaluated on the basis of these experimental data, and the evaluated curve is shown in Fig. 12.

8. The (n,2n) Reaction

Concerning the (n,2n) reaction, two experimental data[41,42], which were obtained by the coincident counting method, are available. In the evaluation we took account of these data, and the evaluated result was

slightly modified so that the elastic scattering cross section, which was given as the difference between the total and reaction cross sections, might be consistent with the experimental data[18,19]. Figure 13 shows the evaluated cross section. The angular and energy distributions were calculated with the three-body phase-space model.

9. Photon Production

9.1 The $(n,n_2\gamma)$ Reaction

The second excited level of ^{6}Li is known[15] to decay by emitting γ-rays, which have isotropic angular distributions, with a probability of 100%. Thus, we gave a value of 1.0 to the γ-ray multiplicity.

9.2 The (n,γ) Reaction

Jurney[43] measured the capture γ-ray spectrum for thermal neutrons with a Ge(Li) detector, and determined the intensities of the γ-rays. We deduced the γ-ray multiplicities from his data as follows:

Transition	Multiplicity
cap. → g.s.	0.61
cap. → 0.47761 MeV	0.39
0.47761 MeV → g.s.	0.39

The angular distribution of the γ-rays was assumed to be isotropic.

10. Energy-Angle Distributions of Secondary Neutrons

The angular and energy distributions of secondary neutrons from the (n,2n) reaction and the inelastic scattering to the continuous levels were calculated with the three-body phase-space model[44]. In general,

the double-differential cross section is given by

$$\frac{d^2\sigma}{dEd\Omega} = \frac{2\pi}{v}\rho(E,\theta)\int |T|^2 d\Omega_{23},$$

where v is the relative velocity of the projectile and target, θ the detection angle, ρ(E,θ) the phase-space factor, T the transition matrix and Ω_{23} the direction of the relative momentum between remaining two particles. If T is independent of E and θ, the shape of the secondary neutron spectrum is determined by the phase-space factor, i.e.,

$$\frac{d^2\sigma}{dEd\Omega} \propto \rho(E,\theta).$$

The three-body phase-space factor is given by

$$\rho(E,\theta) = \frac{2}{(2\pi)^6}\cdot\{M_2M_3M_n/(M_2+M_3)\}^{3/2}\cdot\sqrt{E}\cdot[E_n + Q - E - \frac{1}{2(M_2+M_3)}\{2M_nE_n + 2M_nE - 4M_n\sqrt{E_nE}\cos\theta\}]^{1/2}.$$

Meaning of the symbols used here is,

E_n : incident neutron energy

Q : Q-value

M_n : neutron mass

M_2, M_3 : masses of the two unobserved particles.

In the present evaluation, the calculated double-differential cross section is given in File 6 of ENDF/B format. The energy- and angle-integrated spectra were also calculated, and they are given in File 4 and File 5, respectively. Of course, the angular distribution is given in the laboratory system.

11. Concluding Remarks

Evaluation of neutron nuclear data for ^{6}Li has been performed in the energy range from 10^{-5} eV to 20 MeV.

Concerning the $P_{5/2}$ resonance, the total, elastic scattering and (n,α) reaction cross sections were calculated simultaneously with the R-matrix theory. In higher energy regions above 6 MeV, the present evaluation resolves the problems existing in JENDL-2, that is, underestimation of the total and elastic scattering cross sections.

The double-differential cross section was calculated with the phase-space model. The model is very simple, and so it may not reproduce neutron spectra in the every energy region. In fact the Osaka University group[45)] has pointed out such a problem from analyses of the measured double-differential cross sections. Thus, this problem is left for future work.

The presently evaluated data of ^{6}Li together with ^{7}Li, ^{12}C, ^{16}O, Cr, Fe and Ni were stored in JENDL-3PR1[*)] (JENDL-3 Preliminary Version 1). The data set is used for analyses of joint Japan-USA mock-up experiments of fusion blankets using the FNS facility at JAERI.

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*) In JENDL-3PR1, the ENDF/B-IV format was adopted.

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Table 1 R-matrix parameters used in the n + ^{6}Li analysis.

$J\pi$	$E_\lambda^{J\pi}$	ℓ_n	$\gamma_{\lambda n}^{J\pi}$	$R_{n0}^{\infty J\pi}$	$\gamma_{\lambda n}^{J\pi}$	$R_{n0}^{\infty J\pi}$	ℓ_α	$\gamma_{\lambda\alpha}^{J\pi}$
			(s = 1/2)		(s = 3/2)			
1/2+		0		0.001				
3/2+	1.930	0			1.180	0.0	2	0.460
3/2-	3.430	1	0.875	0.500	1.250	0.200		
5/2-	-0.644	1			0.041	0.0	3	0.429
5/2-	0.212	1			1.000	0.0	3	0.190

$a_n = a_\alpha = 3.853$ fm. $E_\lambda^{J\pi}$ in MeV, $\gamma_{\lambda c}^{J\pi}$ in MeV$^{1/2}$.

The R-matrix is given by

$$R_{c',c}^{J\pi} = R_{c0}^{\infty J\pi}\delta_{c',c} + \sum_\lambda \gamma_{\lambda c'}^{J\pi}\gamma_{\lambda c}^{J\pi}/(E_\lambda^{J\pi} - E).$$

The symbol s denotes the channel spin.

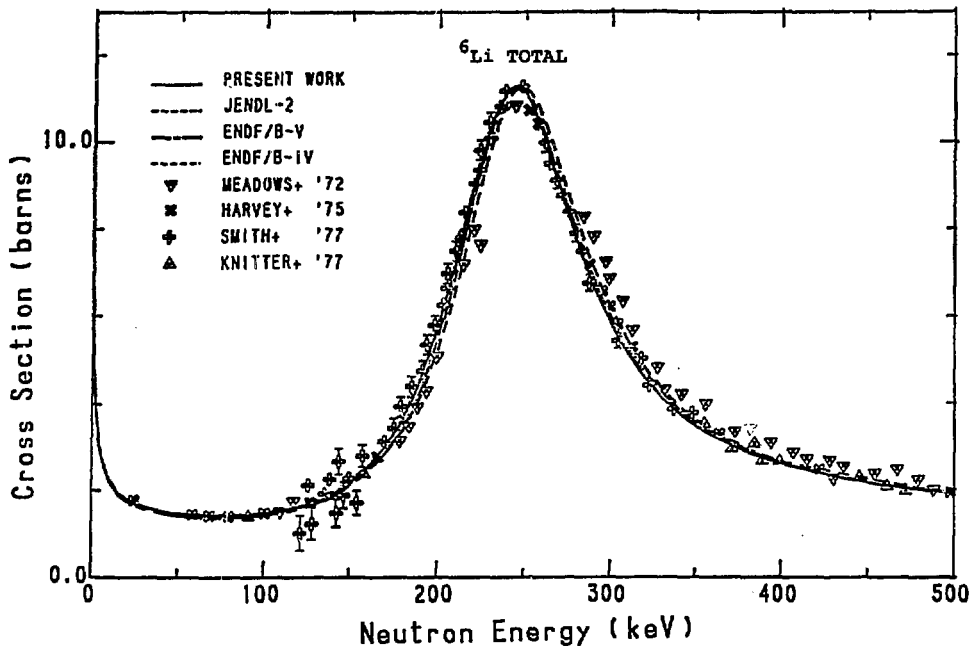

Fig. 1 Measured and evaluated total cross sections below 500 keV.

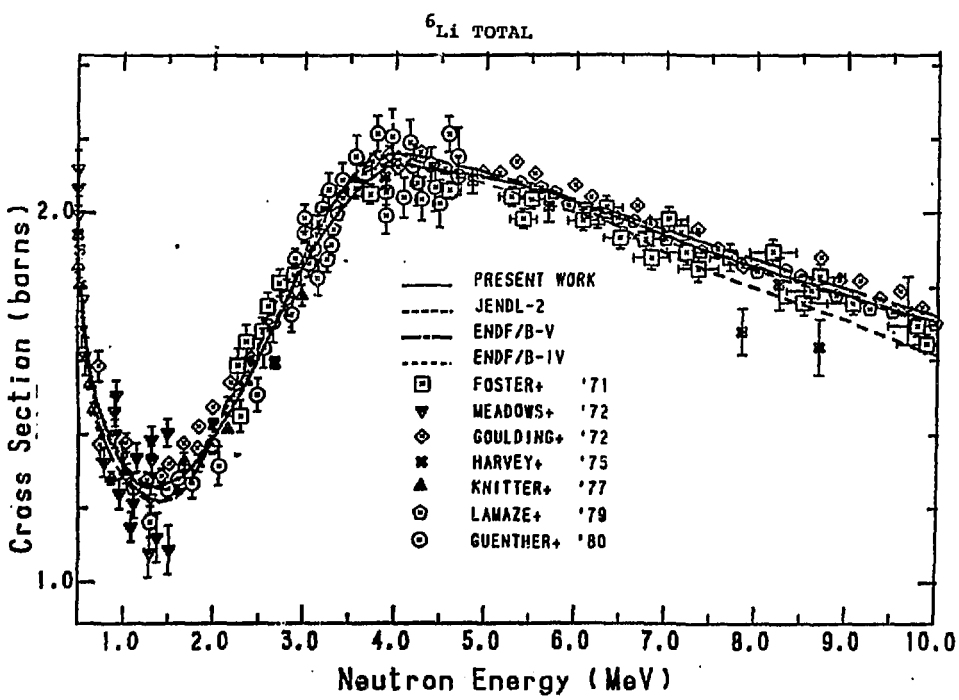

Fig. 2 Measured and evaluated total cross sections from 0.5 to 10 MeV.

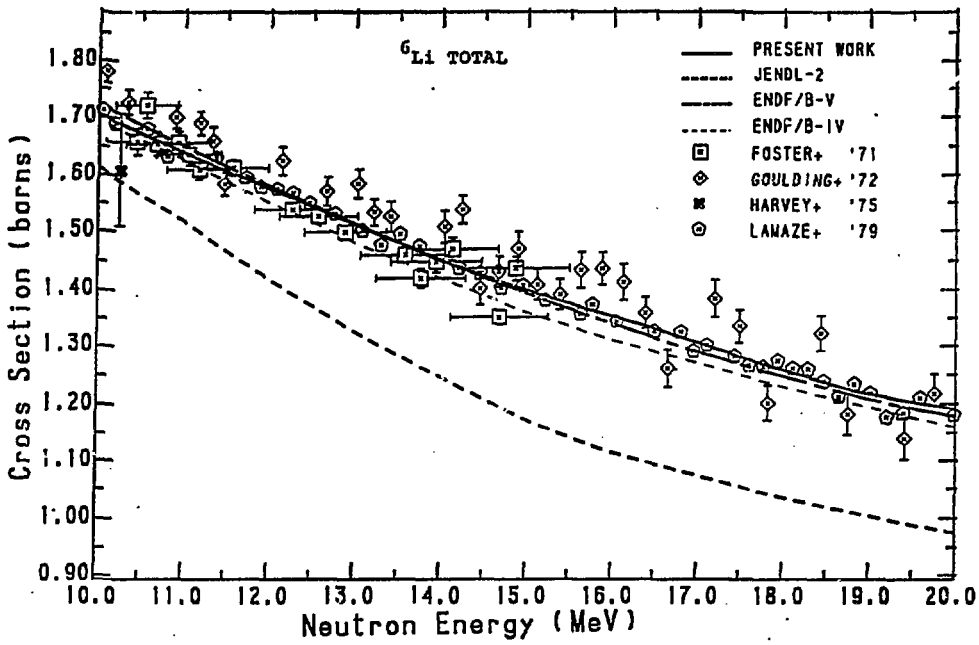

Fig. 3 Measured and evaluated total cross sections above 10 MeV.

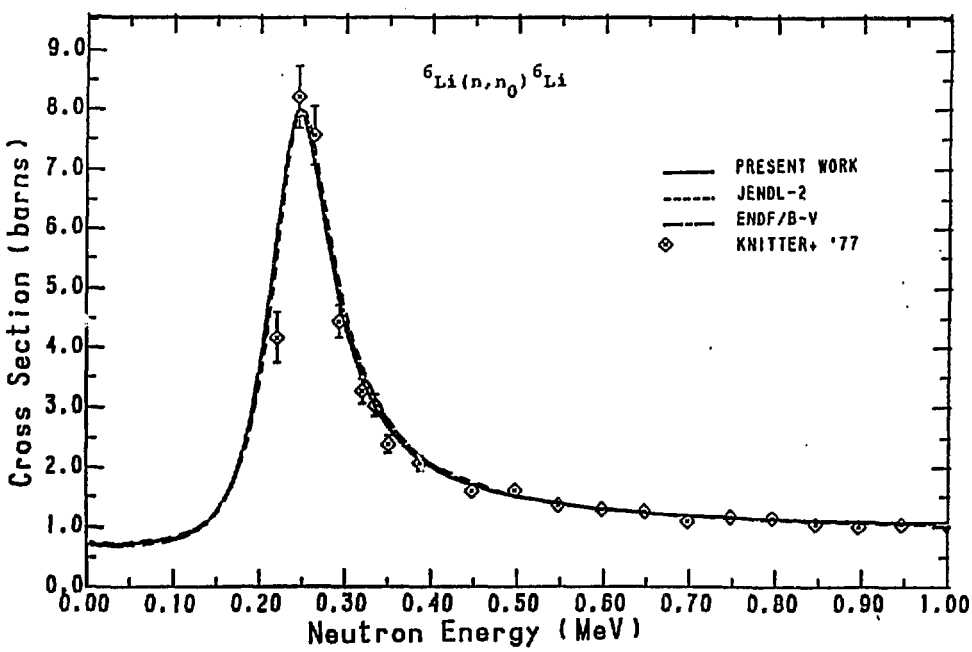

Fig. 4 Measured and evaluated elastic scattering cross sections below 1 MeV.

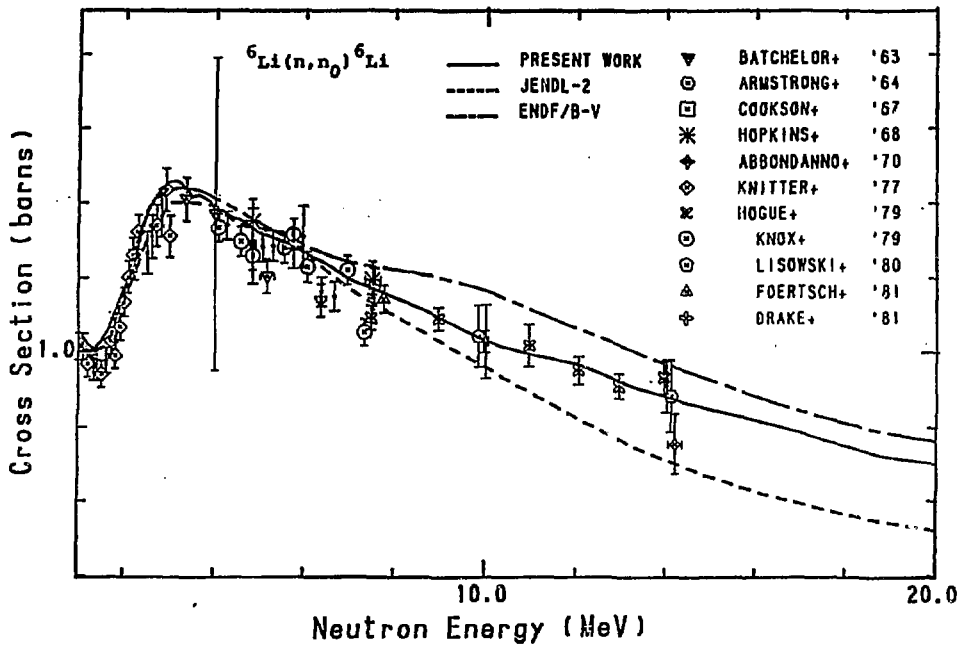

Fig. 5 Measured and evaluated elastic scattering cross sections above 1 MeV.

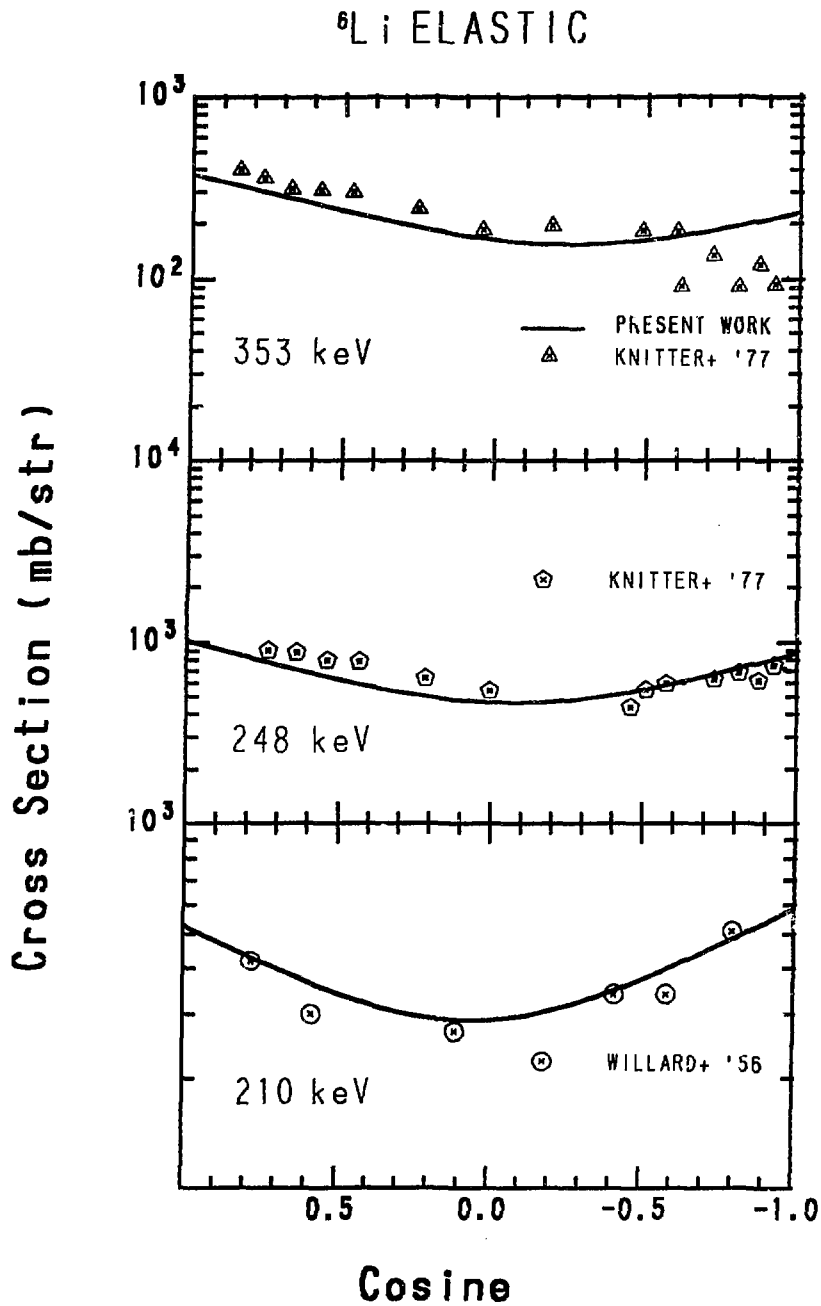

Fig. 6 Measured and evaluated elastic angular distributions.

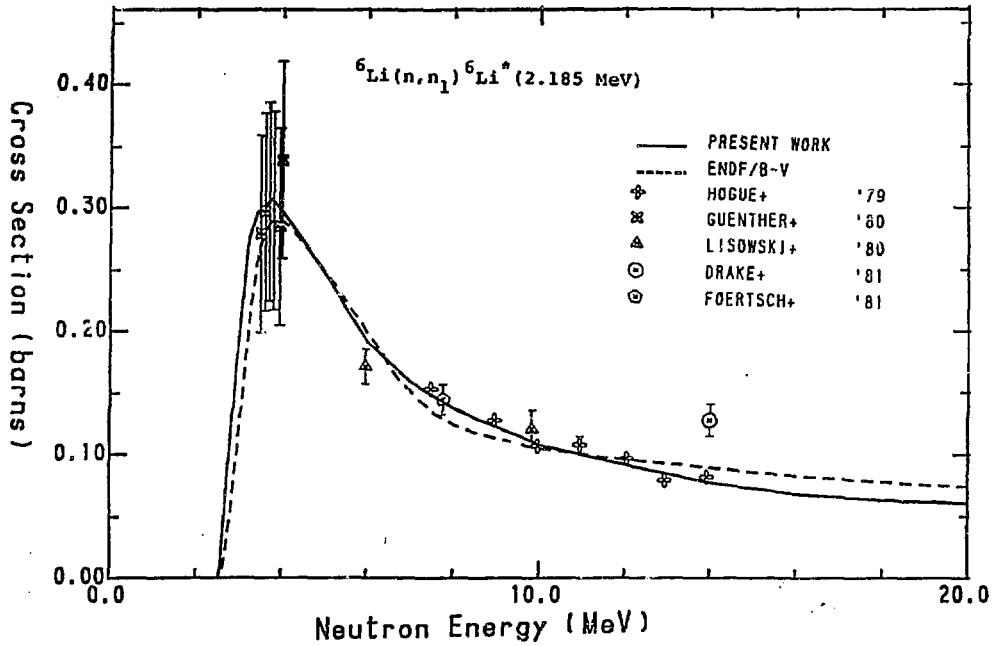

Fig. 7 Measured and evaluated (n,n$_1$) cross sections.

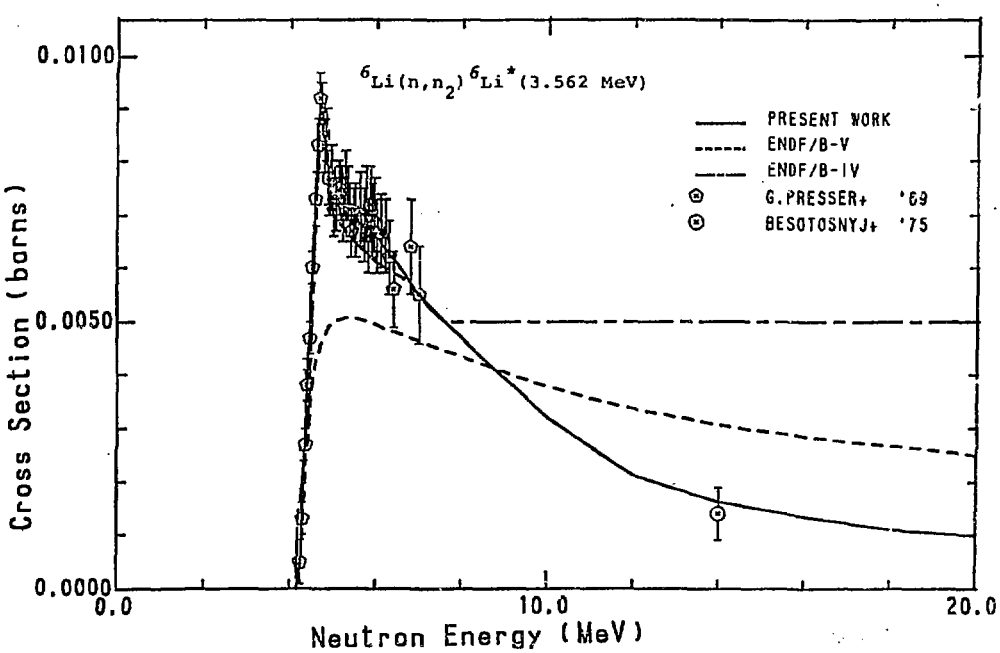

Fig. 8 Measured and evaluated (n,n$_2$) cross sections.

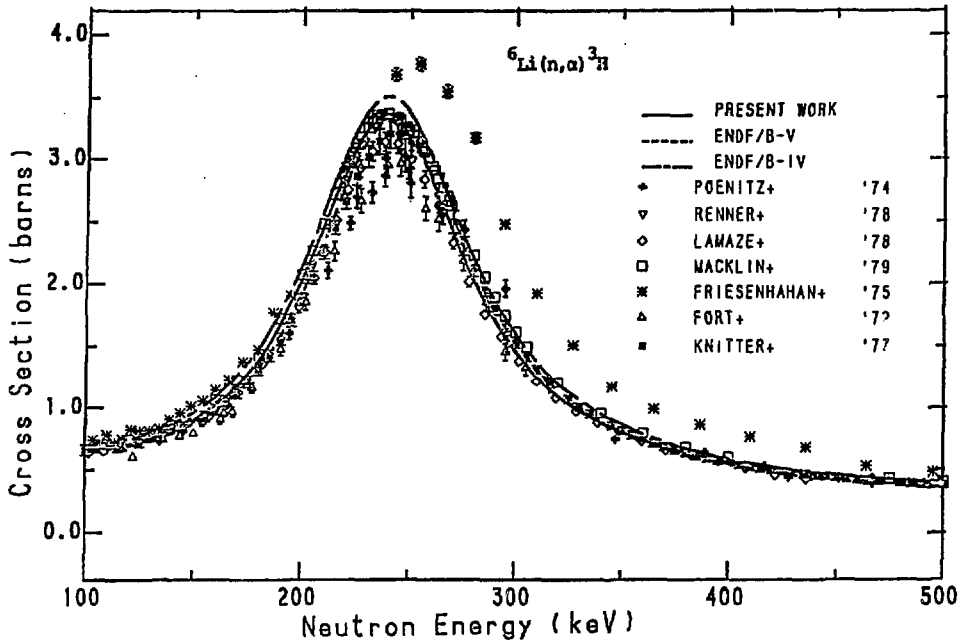

Fig. 9 Measured and evaluated (n,α) cross sections around the $P_{r/o}$ resonance.

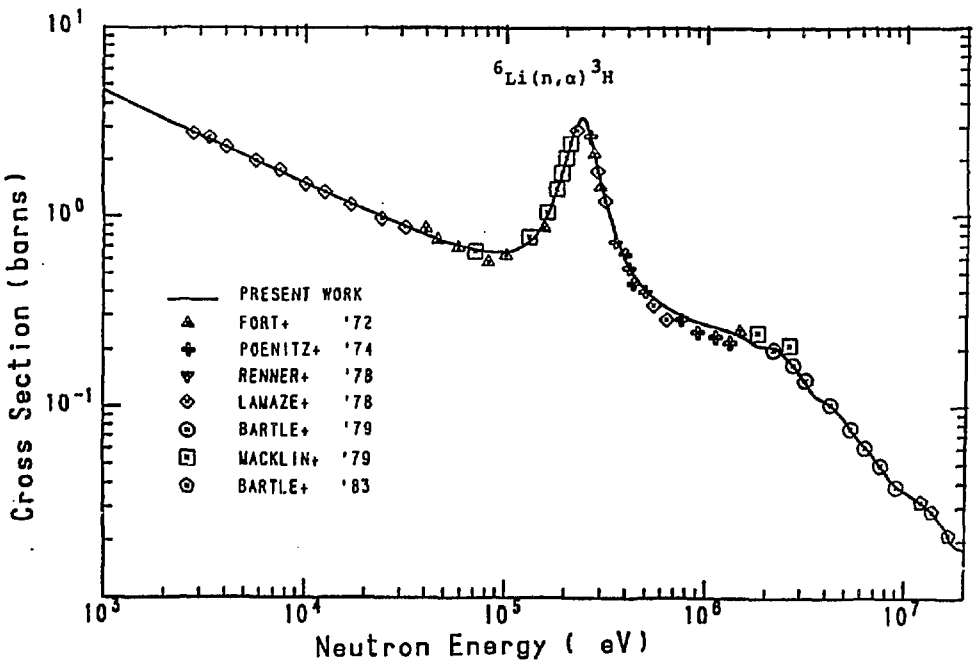

Fig. 10 Measured and evaluated (n,α) cross sections above 1 keV.

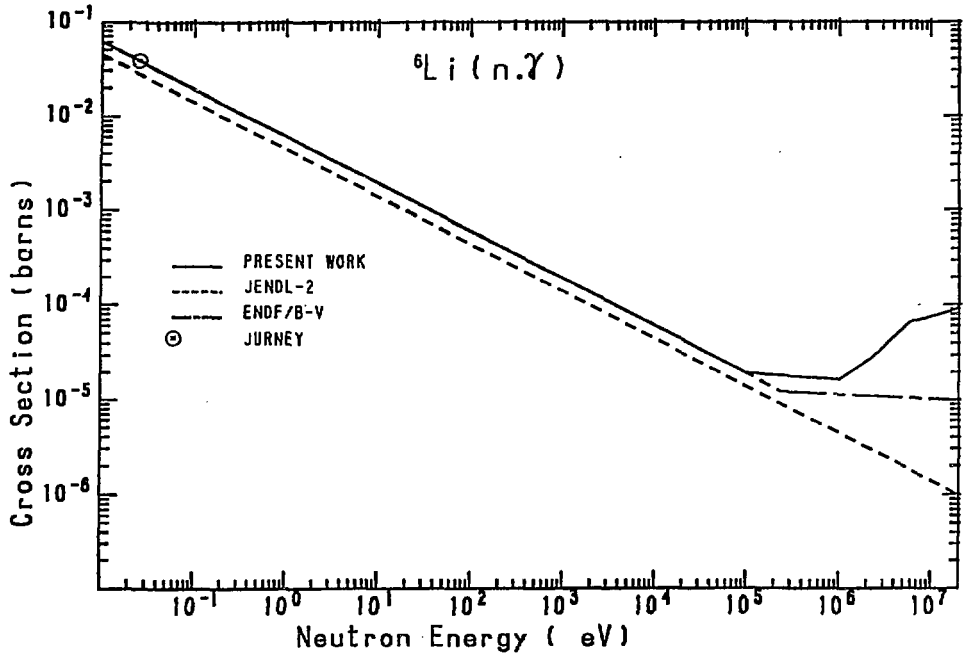

Fig. 11 Measured and evaluated radiative capture cross sections.

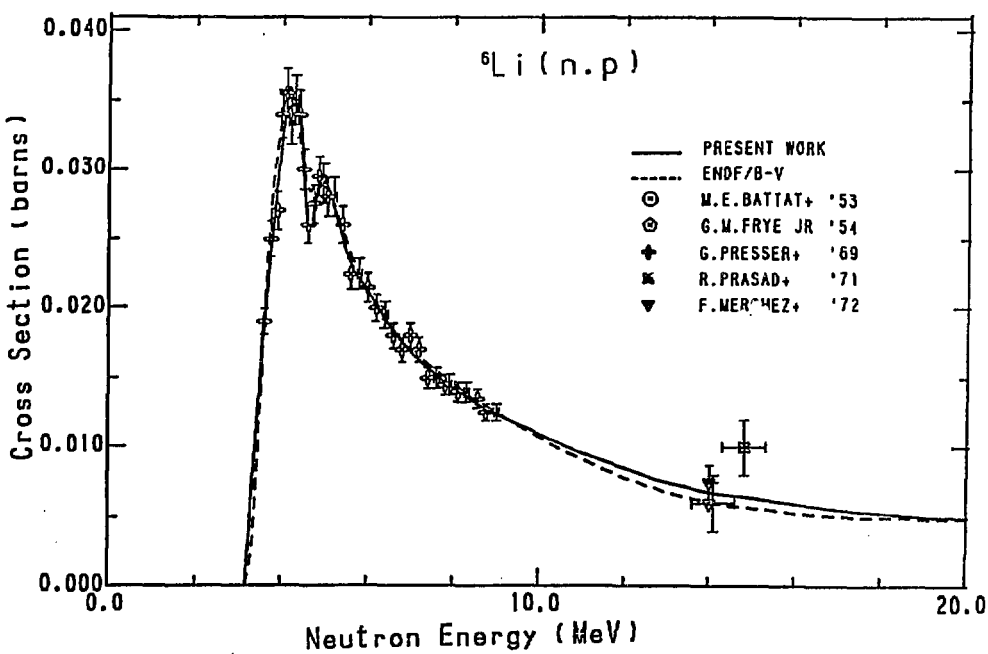

Fig. 12 Measured and evaluated (n,p) cross sections.

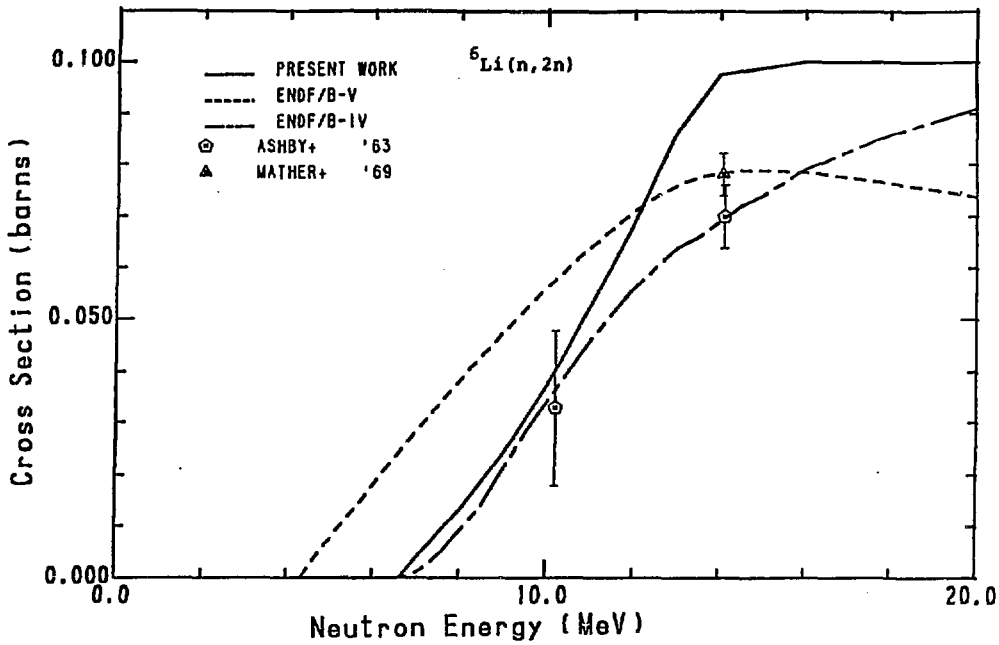

Fig. 13 Measured and evaluated (n,2n) cross sections.

Appendix

List with ENDF/B-V format

File 6 is not included in this listing.

```
........10........20........30........40........50........60......MAT MF MT  SEQ
 3.00600+ 3 5.96345+ 0          0          0          0          0 306 1451    1
 0.0    + 0 0.0    + 0          0          0          0          0 306 1451    2
 0.0    + 0 0.0    + 0          0          0        112         25 306 1451    3
  3-LI-  6 JAERI       EVAL-DEC83 K.SHIBATA                          306 1451    4
                       DIST-JUL84                                    306 1451    5
HISTORY                                                              306 1451    6
83-12  NEWLY EVALUATED BY K.SHIBATA                                  306 1451    7
84-07  DATA OF MF=4 (MT=16,91) AND MF=5 (MT=16,91) WERE REVISED.     306 1451    8
       COMMENT WAS ALSO MODIFIED.                                    306 1451    9
                                                                     306 1451   10
MF=1          GENERAL INFORMATION                                    306 1451   11
  MT=451    DESCRIPTIVE DATA                                         306 1451   12
                                                                     306 1451   13
MF=2          RESONANCE PARAMETERS                                   306 1451   14
  MT=151    SCATTERING RADIUS ONLY.                                  306 1451   15
                                                                     306 1451   16
MF=3          CROSS SECTIONS                                         306 1451   17
  MT=1      SIG-T                                                    306 1451   18
        BELOW 1 MEV BASED ON THE R-MATRIX CALCULATION.  SIG-CAP      306 1451   19
        WAS ADDED TO THE CALCULATED CROSS SECTION.                   306 1451   20
        ABOVE 1 MEV, BASED ON THE EXPERIMENTAL DATA /1/-/3/.         306 1451   21
  MT=2      SIG-EL                                                   306 1451   22
        BELOW 1 MEV, BASED ON THE R-MATRIX CALCULATION.              306 1451   23
        ABOVE 1 MEV, THE CROSS SECTION WAS OBTAINED BY SUBTRACTING   306 1451   24
        THE REACTION CROSS SECTION FROM THE TOTAL CROSS SECTION.     306 1451   25
  MT=3      NON-ELASTIC                                              306 1451   26
        SUM OF MT=4, 16, 102, 103 AND 107.                           306 1451   27
  MT=4      TOTAL INELASTIC                                          306 1451   28
        SUM OF MT=51, 52 AND 91.                                     306 1451   29
  MT=16     (N,2N)LI5                                                306 1451   30
        BASED ON THE EXPERIMENTAL DATA /4/,/5/.                      306 1451   31
  MT=51     SIG-IN    2.185 MEV                                      306 1451   32
        BASED ON THE EXPERIMENTAL DATA /3/,/6/-/9/.                  306 1451   33
  MT=52     SIG-IN    3.562 MEV                                      306 1451   34
        BASED ON THE EXPERIMENTAL DATA /10/,/11/.                    306 1451   35
  MT=91     (N,N')ALPHA-D                                            306 1451   36
        THE (N,N')ALPHA-D CROSS SECTION WAS BASED ON THE             306 1451   37
        MEASUREMENT OF ROSEN AND STEWART /12/.  THE CONTRIBUTION     306 1451   38
        FROM MT=51 WAS SUBTRACTED SO THAT SIG-T MIGHT BE EQAUL TO    306 1451   39
        THE SUM OF PARTIAL CROSS SECTIONS.                           306 1451   40
  MT=102    CAPTURE                                                  306 1451   41
        BELOW 100 KEV, 1/V CURVE NORMALIZED TO THE THERMAL DATA      306 1451   42
        OF JURNEY /13/.                                              306 1451   43
        ABOVE 100 KEV, THE INVERSE REACTION DATA OF FERDINANDE       306 1451   44
        ET AL./14/ WERE ADDED.                                       306 1451   45
  MT=103    (N,P)                                                    306 1451   46
        BASED ON THE EXPERIMENTAL DATA /10/,/15/.                    306 1451   47
  MT=107    (N,ALPHA)T                                               306 1451   48
        BELOW 1 MEV, R-MATRIX CALCULATION.                           306 1451   49
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........10........20........30........40........50........60......MAT MF MT  SEQ
        ABOVE 1 MEV, BASED ON THE EXPERIMENTAL DATA /16/,/17/.     306 1451  50
  MT=251    MU-BAR                                                 306 1451  51
        CALCULATED FROM THE DATA IN FILE4.                         306 1451  52
                                                                   306 1451  53
MF=4            ANGULAR DISTRIBUTIONS OF SECONDARY NEUTRONS        306 1451  54
  MT=2                                                             306 1451  55
        BELOW 500 KEV, R-MATRIX CALCULATION.                       306 1451  56
        BETWEEN 500 KEV AND 14 MEV, BASED ON THE EXPERIMENTAL      306 1451  57
        DATA /1/,/6/,/18/.                                         306 1451  58
        ABOVE 14 MEV, OPTICAL MODEL CALCULATION.  THE POTENTIAL    306 1451  59
        PARAMETERS WERE TAKEN FROM AGEE AND ROSEN /19/.            306 1451  60
  MT=16                                                            306 1451  61
        CALCULATED WITH THE 3-BODY PHASE-SPACE MODEL.              306 1451  62
        ANGULAR DISTRIBUTIONS ARE GIVEN IN THE LABORATORY SYSTEM.  306 1451  63
  MT=51                                                            306 1451  64
        BELOW 4.8 MEV, ASSUMED TO BE ISOTROPIC IN CM.              306 1451  65
        ABOVE 4.8 MEV, BASED ON THE EXPERIMENTAL DATA /6/,/20/     306 1451  66
  MT=52                                                            306 1451  67
        ASSUMED TO BE ISOTROPIC IN CM.                             306 1451  68
  MT=91                                                            306 1451  69
        CALCULATED WITH THE 3-BODY PHASE-SPACE MODEL.              306 1451  70
        ANGULAR DISTRIBUTIONS ARE GIVEN IN THE LABORATORY SYSTEM.  306 1451  71
                                                                   306 1451  72
MF=5            ENERGY DISTRIBUTION OF SECONDARY NEUTRONS          306 1451  73
  MT=16,91                                                         306 1451  74
        THREE-BODY PHASE-SPACE FACTORS WERE CALCULATED.            306 1451  75
                                                                   306 1451  76
MF=6            ENERGY-ANGULAR DISTRIBUTIONS FOR SECONDARY NEUTRONS 306 1451 77
        USE OF FILE6 IS RECOMMENDED FOR TRANSPORT CALCULATIONS.    306 1451  78
  MT=16,91                                                         306 1451  79
        PHASE-SPACE FACTORS                                        306 1451  80
                                                                   306 1451  81
MF=12           PHOTON-PRODUCTION MULTIPLICITIES                   306 1451  82
  MT=52                                                            306 1451  83
        M=1.0                                                      306 1451  84
  MT=102                                                           306 1451  85
        BASED ON THE THERMAL MEASUREMENT OF JURNEY /13/.           306 1451  86
                                                                   306 1451  87
MF=14           PHOTON ANGULAR DISTRIBUTIONS                       306 1451  88
  MT=52                                                            306 1451  89
        ISOTROPIC                                                  306 1451  90
  MT=102                                                           306 1451  91
        ASSUMED TO BE ISOTROPIC.                                   306 1451  92
                                                                   306 1451  93
REFERENCES                                                         306 1451  94
 1) KNITTER H.-H. ET AL.: EUR-5726E (1977).                        306 1451  95
 2) LAMAZE G.P. ET AL.: BULL. AM. PHYS. SOC. 24 (1979) 862.        306 1451  96
 3) GUENTHER P. ET AL.: ANL/NDM-52 (1980).                         306 1451  97
 4) MATHER D.S. AND PAIN L.F.: AWRE-O-47/69 (1969).                306 1451  98
 5) ASHBY V.J. ET AL.: PHYS. REV. 129 (1963) 1771.                 306 1451  99
 6) HOGUE H.H. ET AL.: NUCL. SCI. ENG. 69 (1979) 22.               306 1451 100
 7) LISOWSKI P.W. ET AL.: LA-8342 (1980).                          306 1451 101
 8) FOERTSCH H. ET AL.: ZFK-443 (1981), P.13.                      306 1451 102
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........10........20........30........40........50........60......MAT MF MT  SEQ
 9) DRAKE D.M.: DOE/NDC-24/U (1981), P.72.                          306 1451  103
10) PRESSER G. ET AL.: NUCL. PHYS. A131 (1969) 679.                 306 1451  104
11) BESOTOSNYJ ET AL.: YK-19 (1975), P.77.                          306 1451  105
12) ROSEN L. AND STEWART L.: PHYS. REV. 126 (1962) 1150.            306 1451  106
13) JURNEY E.T.: USNDC-9 (1973), P.109.                             306 1451  107
14) FERDINANDE H. ET AL.: CAN. J. PHYS. 55 (1977) 428.              306 1451  108
15) MERCHEZ F. ET AL.: NUCL. PHYS. A182 (1972) 428.                 306 1451  109
16) BARTLE C.M.: NUCL. PHYS. A330 (1979) 1.                         306 1451  110
17) BARTLE C.M. ET AL.: NUCL. PHYS. A397 (1983) 21.                 306 1451  111
18) KNOX H.D. ET AL.: NUCL. SCI. ENG. 69 (1979) 223.                306 1451  112
19) AGEE F.P. AND ROSEN L.: LA-3538-MS (1966).                      306 1451  113
20) HOPKINS J.C. ET AL.: NUCL. PHYS. A107 (1968) 139.               306 1451  114
                                                                    306 1451  115
                                  1        451        140           306 1451  116
                                  2        151          4           306 1451  117
                                  3          1         77           306 1451  118
                                  3          2         98           306 1451  119
                                  3          3        140           306 1451  120
                                  3          4         22           306 1451  121
                                  3         16          7           306 1451  122
                                  3         51          9           306 1451  123
                                  3         52         16           306 1451  124
                                  3         91         12           306 1451  125
                                  3        102          9           306 1451  126
                                  3        103         16           306 1451  127
                                  3        107         77           306 1451  128
                                  3        251         67           306 1451  129
                                  4          2        415           306 1451  130
                                  4         16        133           306 1451  131
                                  4         51         26           306 1451  132
                                  4         52         10           306 1451  133
                                  4         91        178           306 1451  134
                                  5         16        135           306 1451  135
                                  5         91        180           306 1451  136
                                 12         52          4           306 1451  137
                                 12        102         13           306 1451  138
                                 14         52          1           306 1451  139
                                 14        102          1           306 1451  140
                                                                    306 1  0  141
                                                                    306 0  0  142
3.00600+ 3 5.96345+ 0          0          0          1         0 306 2151  143
3.00600+ 3 1.00000+ 0          0          0          1         0 306 2151  144
1.00000- 5 1.00000+ 5          0          0          0         0 306 2151  145
1.00000+ 0 2.42000- 1          0          0          0         0 306 2151  146
                                                                    306 2  0  147
                                                                    306 0  0  148
3.00600+ 3 5.96345+ 0          0         99          0         0 306 3  1  149
0.0     + 0 0.0     + 0        0          0          2       222 306 3  1  150
        25          5        222          2          0         0 306 3  1  151
1.00000- 5 4.73017+ 4 1.00000- 4 1.49583+ 4 1.00000- 3 4.73082+ 3 306 3  1  152
1.00000- 2 1.49650+ 3 2.53000- 2 9.41103+ 2 1.00000- 1 4.73724+ 2 306 3  1  153
1.00000+ 0 1.50291+ 2 1.00000+ 1 4.80178+ 1 1.00000+ 2 1.56763+ 1 306 3  1  154
3.16228+ 2 9.13346+ 0 1.00000+ 3 5.45525+ 0 2.00000+ 3 4.07353+ 0 306 3  1  155
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6.00000+ 3	2.66900+ 0	7.00000+ 3	2.52757+ 0	8.00000+ 3	2.41378+ 0	306	3	1	157
9.00000+ 3	2.31968+ 0	1.00000+ 4	2.24041+ 0	2.00000+ 4	1.81582+ 0	306	3	1	158
3.00000+ 4	1.63690+ 0	4.00000+ 4	1.53762+ 0	5.00000+ 4	1.47735+ 0	306	3	1	159
6.00000+ 4	1.44199+ 0	7.00000+ 4	1.42565+ 0	8.00000+ 4	1.42557+ 0	306	3	1	160
9.00000+ 4	1.44164+ 0	1.00000+ 5	1.47516+ 0	1.10000+ 5	1.53037+ 0	306	3	1	161
1.20000+ 5	1.61395+ 0	1.30000+ 5	1.72777+ 0	1.40000+ 5	1.88268+ 0	306	3	1	162
1.50000+ 5	2.15856+ 0	1.60000+ 5	2.49902+ 0	1.65000+ 5	2.72937+ 0	306	3	1	163
1.70000+ 5	2.97152+ 0	1.75000+ 5	3.29107+ 0	1.80000+ 5	3.62602+ 0	306	3	1	164
1.85000+ 5	4.06532+ 0	1.90000+ 5	4.52352+ 0	1.95000+ 5	5.11202+ 0	306	3	1	165
2.00000+ 5	5.72032+ 0	2.05000+ 5	6.46387+ 0	2.10000+ 5	7.22032+ 0	306	3	1	166
2.15000+ 5	8.05692+ 0	2.16000+ 5	8.22370+ 0	2.17000+ 5	8.39008+ 0	306	3	1	167
2.18000+ 5	8.55586+ 0	2.19000+ 5	8.72094+ 0	2.20000+ 5	8.88522+ 0	306	3	1	168
2.21000+ 5	9.03946+ 0	2.22000+ 5	9.19250+ 0	2.23000+ 5	9.34434+ 0	306	3	1	169
2.24000+ 5	9.49488+ 0	2.25000+ 5	9.64372+ 0	2.26000+ 5	9.79096+ 0	306	3	1	170
2.27000+ 5	9.93630+ 0	2.28000+ 5	1.00797+ 1	2.29000+ 5	1.02211+ 1	306	3	1	171
2.30000+ 5	1.03602+ 1	2.31000+ 5	1.04548+ 1	2.32000+ 5	1.05469+ 1	306	3	1	172
2.33000+ 5	1.06365+ 1	2.34000+ 5	1.07236+ 1	2.35000+ 5	1.08079+ 1	306	3	1	173
2.36000+ 5	1.08897+ 1	2.37000+ 5	1.09687+ 1	2.38000+ 5	1.10449+ 1	306	3	1	174
2.39000+ 5	1.11185+ 1	2.40000+ 5	1.11892+ 1	2.41000+ 5	1.11961+ 1	306	3	1	175
2.42000+ 5	1.11997+ 1	2.43000+ 5	1.12003+ 1	2.44000+ 5	1.11977+ 1	306	3	1	176
2.45000+ 5	1.11922+ 1	2.46000+ 5	1.11837+ 1	2.47000+ 5	1.11725+ 1	306	3	1	177
2.48000+ 5	1.11586+ 1	2.49000+ 5	1.11422+ 1	2.50000+ 5	1.11234+ 1	306	3	1	178
2.51000+ 5	1.10415+ 1	2.52000+ 5	1.09576+ 1	2.53000+ 5	1.08718+ 1	306	3	1	179
2.54000+ 5	1.07844+ 1	2.55000+ 5	1.06954+ 1	2.56000+ 5	1.06050+ 1	306	3	1	180
2.57000+ 5	1.05134+ 1	2.58000+ 5	1.04209+ 1	2.59000+ 5	1.03274+ 1	306	3	1	181
2.60000+ 5	1.02332+ 1	2.61000+ 5	1.01100+ 1	2.62000+ 5	9.98632+ 0	306	3	1	182
2.63000+ 5	9.86227+ 0	2.64000+ 5	9.73802+ 0	2.65000+ 5	9.61377+ 0	306	3	1	183
2.66000+ 5	9.48942+ 0	2.67000+ 5	9.36527+ 0	2.68000+ 5	9.24122+ 0	306	3	1	184
2.69000+ 5	9.11747+ 0	2.70000+ 5	8.99412+ 0	2.71000+ 5	8.86871+ 0	306	3	1	185
2.72000+ 5	8.74380+ 0	2.73000+ 5	8.61939+ 0	2.74000+ 5	8.49558+ 0	306	3	1	186
2.75000+ 5	8.37227+ 0	2.76000+ 5	8.24966+ 0	2.77000+ 5	8.12765+ 0	306	3	1	187
2.78000+ 5	8.00634+ 0	2.79000+ 5	7.88573+ 0	2.80000+ 5	7.76582+ 0	306	3	1	188
2.85000+ 5	7.22562+ 0	2.90000+ 5	6.70362+ 0	2.95000+ 5	6.26217+ 0	306	3	1	189
3.00000+ 5	5.83652+ 0	3.10000+ 5	5.14352+ 0	3.20000+ 5	4.59122+ 0	306	3	1	190
3.30000+ 5	4.14850+ 0	3.40000+ 5	3.79041+ 0	3.50000+ 5	3.49238+ 0	306	3	1	191
3.60000+ 5	3.24586+ 0	3.70000+ 5	3.03979+ 0	3.80000+ 5	2.86581+ 0	306	3	1	192
3.90000+ 5	2.71747+ 0	4.00000+ 5	2.58988+ 0	4.10000+ 5	2.47927+ 0	306	3	1	193
4.20000+ 5	2.38271+ 0	4.30000+ 5	2.29767+ 0	4.40000+ 5	2.22253+ 0	306	3	1	194
4.50000+ 5	2.15558+ 0	4.60000+ 5	2.09561+ 0	4.70000+ 5	2.04174+ 0	306	3	1	195
4.80000+ 5	1.99307+ 0	4.90000+ 5	1.94891+ 0	5.00000+ 5	1.90871+ 0	306	3	1	196
5.10000+ 5	1.87195+ 0	5.20000+ 5	1.83824+ 0	5.30000+ 5	1.80727+ 0	306	3	1	197
5.40000+ 5	1.77867+ 0	5.50000+ 5	1.75162+ 0	5.60000+ 5	1.72653+ 0	306	3	1	198
5.70000+ 5	1.70316+ 0	5.80000+ 5	1.68135+ 0	5.90000+ 5	1.66108+ 0	306	3	1	199
6.00000+ 5	1.64201+ 0	6.10000+ 5	1.62421+ 0	6.20000+ 5	1.60746+ 0	306	3	1	200
6.30000+ 5	1.59174+ 0	6.40000+ 5	1.57692+ 0	6.50000+ 5	1.56299+ 0	306	3	1	201
6.60000+ 5	1.54984+ 0	6.70000+ 5	1.53744+ 0	6.80000+ 5	1.52569+ 0	306	3	1	202
6.90000+ 5	1.51448+ 0	7.00000+ 5	1.50399+ 0	7.10000+ 5	1.49392+ 0	306	3	1	203
7.20000+ 5	1.48445+ 0	7.30000+ 5	1.47539+ 0	7.40000+ 5	1.46681+ 0	306	3	1	204
7.50000+ 5	1.45852+ 0	7.60000+ 5	1.45060+ 0	7.70000+ 5	1.44306+ 0	306	3	1	205
7.80000+ 5	1.43588+ 0	7.90000+ 5	1.42907+ 0	8.00000+ 5	1.42253+ 0	306	3	1	206
8.10000+ 5	1.41623+ 0	8.20000+ 5	1.41030+ 0	8.30000+ 5	1.40461+ 0	306	3	1	207
8.40000+ 5	1.39917+ 0	8.50000+ 5	1.39398+ 0	8.60000+ 5	1.38892+ 0	306	3	1	208

```
........10........20........30........40........50........60......MAT MF MT   SEQ
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 9.00000+ 5 1.37127+ 0 9.10000+ 5 1.36728+ 0 9.20000+ 5 1.36353+ 0 306 3  1   210
 9.30000+ 5 1.35990+ 0 9.40000+ 5 1.35649+ 0 9.50000+ 5 1.35321+ 0 306 3  1   211
 9.60000+ 5 1.35005+ 0 9.70000+ 5 1.34711+ 0 9.80000+ 5 1.34429+ 0 306 3  1   212
 9.90000+ 5 1.34158+ 0 1.00000+ 6 1.32000+ 0 1.05000+ 6 1.29770+ 0 306 3  1   213
 1.15000+ 6 1.26480+ 0 1.25000+ 6 1.25470+ 0 1.35850+ 6 1.25690+ 0 306 3  1   214
 1.46280+ 6 1.26130+ 0 1.65530+ 6 1.28410+ 0 1.84790+ 6 1.33710+ 0 306 3  1   215
 2.04000+ 6 1.40870+ 0 2.23290+ 6 1.48720+ 0 2.45760+ 6 1.59100+ 0 306 3  1   216
 2.68220+ 6 1.70870+ 0 2.90700+ 6 1.82350+ 0 3.13150+ 6 1.91830+ 0 306 3  1   217
 3.38820+ 6 2.00640+ 0 3.64500+ 6 2.08040+ 0 3.90170+ 6 2.12730+ 0 306 3  1   218
 4.15840+ 6 2.13370+ 0 4.35100+ 6 2.12270+ 0 4.54350+ 6 2.11540+ 0 306 3  1   219
 4.73610+ 6 2.10960+ 0 4.92860+ 6 2.10310+ 0 5.64260+ 6 2.06040+ 0 306 3  1   220
 6.35670+ 6 1.99770+ 0 7.07100+ 6 1.92940+ 0 7.78470+ 6 1.86970+ 0 306 3  1   221
 8.64320+ 6 1.80670+ 0 9.50160+ 6 1.74220+ 0 1.03600+ 7 1.68000+ 0 306 3  1   222
 1.12190+ 7 1.62370+ 0 1.22610+ 7 1.55800+ 0 1.33040+ 7 1.49160+ 0 306 3  1   223
 1.43470+ 7 1.43040+ 0 1.53900+ 7 1.38050+ 0 1.65300+ 7 1.32850+ 0 306 3  1   224
 1.76700+ 7 1.27240+ 0 1.88080+ 7 1.22280+ 0 2.00000+ 7 1.19050+ 0 306 3  1   225
                                                                   306 3  0   226
 3.00600+ 3 5.96345+ 0          0          0          0          0 306 3  2   227
 0.0    + 0 0.0    + 0          0          0          1        284 306 3  2   228
        284            2          0          0          0          0 306 3  2   229
 1.00000- 5 7.34930- 1 1.00000- 4 7.34930- 1 1.00000- 3 7.34930- 1 306 3  2   230
 1.00000- 2 7.34930- 1 2.53000- 2 7.34930- 1 1.00000- 1 7.34920- 1 306 3  2   231
 1.00000+ 0 7.34910- 1 1.00000+ 1 7.34870- 1 1.00000+ 2 7.34740- 1 306 3  2   232
 1.00000+ 3 7.34160- 1 2.00000+ 3 7.33690- 1 3.00000+ 3 7.33280- 1 306 3  2   233
 4.00000+ 3 7.32900- 1 5.00000+ 3 7.32550- 1 6.00000+ 3 7.32220- 1 306 3  2   234
 7.00000+ 3 7.31900- 1 8.00000+ 3 7.31610- 1 9.00000+ 3 7.31320- 1 306 3  2   235
 1.00000+ 4 7.31050- 1 2.00000+ 4 7.29080- 1 3.00000+ 4 7.28670- 1 306 3  2   236
 4.00000+ 4 7.30000- 1 5.00000+ 4 7.33390- 1 6.00000+ 4 7.39530- 1 306 3  2   237
 7.00000+ 4 7.49330- 1 8.00000+ 4 7.63810- 1 9.00000+ 4 7.84470- 1 306 3  2   238
 1.00000+ 5 8.13260- 1 1.10000+ 5 8.53430- 1 1.20000+ 5 9.09740- 1 306 3  2   239
 1.30000+ 5 9.85060- 1 1.40000+ 5 1.08690+ 0 1.50000+ 5 1.26170+ 0 306 3  2   240
 1.60000+ 5 1.48430+ 0 1.70000+ 5 1.79760+ 0 1.80000+ 5 2.23850+ 0 306 3  2   241
 1.90000+ 5 2.85370+ 0 2.00000+ 5 3.68970+ 0 2.10000+ 5 4.76080+ 0 306 3  2   242
 2.20000+ 5 5.98360+ 0 2.30000+ 5 7.11600+ 0 2.40000+ 5 7.82540+ 0 306 3  2   243
 2.50000+ 5 7.90790+ 0 2.60000+ 5 7.38090+ 0 2.70000+ 5 6.56940+ 0 306 3  2   244
 2.80000+ 5 5.73430+ 0 2.90000+ 5 4.99650+ 0 3.00000+ 5 4.38520+ 0 306 3  2   245
 3.10000+ 5 3.89110+ 0 3.20000+ 5 3.49370+ 0 3.30000+ 5 3.17270+ 0 306 3  2   246
 3.40000+ 5 2.91140+ 0 3.50000+ 5 2.69230+ 0 3.60000+ 5 2.51010+ 0 306 3  2   247
 3.70000+ 5 2.35710+ 0 3.80000+ 5 2.22740+ 0 3.90000+ 5 2.11640+ 0 306 3  2   248
 4.00000+ 5 2.02060+ 0 4.10000+ 5 1.93730+ 0 4.20000+ 5 1.86440+ 0 306 3  2   249
 4.30000+ 5 1.80000+ 0 4.40000+ 5 1.74300+ 0 4.50000+ 5 1.69210+ 0 306 3  2   250
 4.60000+ 5 1.64640+ 0 4.70000+ 5 1.60530+ 0 4.80000+ 5 1.56810+ 0 306 3  2   251
 4.90000+ 5 1.53430+ 0 5.00000+ 5 1.50350+ 0 5.10000+ 5 1.47530+ 0 306 3  2   252
 5.20000+ 5 1.44940+ 0 5.30000+ 5 1.42560+ 0 5.40000+ 5 1.40360+ 0 306 3  2   253
 5.50000+ 5 1.38270+ 0 5.60000+ 5 1.36330+ 0 5.70000+ 5 1.34520+ 0 306 3  2   254
 5.80000+ 5 1.32830+ 0 5.90000+ 5 1.31260+ 0 6.00000+ 5 1.29780+ 0 306 3  2   255
 6.10000+ 5 1.28400+ 0 6.20000+ 5 1.27100+ 0 6.30000+ 5 1.25880+ 0 306 3  2   256
 6.40000+ 5 1.24730+ 0 6.50000+ 5 1.23650+ 0 6.60000+ 5 1.22630+ 0 306 3  2   257
 6.70000+ 5 1.21670+ 0 6.80000+ 5 1.20760+ 0 6.90000+ 5 1.19890+ 0 306 3  2   258
 7.00000+ 5 1.19080+ 0 7.10000+ 5 1.18300+ 0 7.20000+ 5 1.17570+ 0 306 3  2   259
 7.30000+ 5 1.16870+ 0 7.40000+ 5 1.16210+ 0 7.50000+ 5 1.15570+ 0 306 3  2   260
 7.60000+ 5 1.14960+ 0 7.70000+ 5 1.14380+ 0 7.80000+ 5 1.13830+ 0 306 3  2   261
```

.....10	20	30	40	50	60	MAT	MF	MT	SEQ
7.90000+ 5	1.13310+ 0	8.00000+ 5	1.12810+ 0	8.10000+ 5	1.12330+ 0	306	3	2	262
8.20000+ 5	1.11880+ 0	8.30000+ 5	1.11450+ 0	8.40000+ 5	1.11040+ 0	306	3	2	263
8.50000+ 5	1.10650+ 0	8.60000+ 5	1.10270+ 0	8.70000+ 5	1.09920+ 0	306	3	2	264
8.80000+ 5	1.09590+ 0	8.90000+ 5	1.09270+ 0	9.00000+ 5	1.08970+ 0	306	3	2	265
9.10000+ 5	1.08680+ 0	9.20000+ 5	1.08410+ 0	9.30000+ 5	1.08150+ 0	306	3	2	266
9.40000+ 5	1.07910+ 0	9.50000+ 5	1.07680+ 0	9.60000+ 5	1.07460+ 0	306	3	2	267
9.70000+ 5	1.07260+ 0	9.80000+ 5	1.07070+ 0	9.90000+ 5	1.06890+ 0	306	3	2	268
1.00000+ 6	1.04820+ 0	1.05000+ 6	1.03013+ 0	1.10000+ 6	1.01763+ 0	306	3	2	269
1.15000+ 6	1.00493+ 0	1.20000+ 6	1.00352+ 0	1.25000+ 6	1.00204+ 0	306	3	2	270
1.30000+ 6	1.00661+ 0	1.35000+ 6	1.01120+ 0	1.35850+ 6	1.01198+ 0	306	3	2	271
1.40000+ 6	1.01674+ 0	1.45000+ 6	1.02251+ 0	1.46280+ 6	1.02400+ 0	306	3	2	272
1.50000+ 6	1.03119+ 0	1.55000+ 6	1.04093+ 0	1.60000+ 6	1.05075+ 0	306	3	2	273
1.65000+ 6	1.06064+ 0	1.65530+ 6	1.06170+ 0	1.70000+ 6	1.07761+ 0	306	3	2	274
1.72057+ 6	1.08497+ 0	1.75000+ 6	1.09361+ 0	1.80000+ 6	1.10835+ 0	306	3	2	275
1.84790+ 6	1.11893+ 0	2.04000+ 6	1.18008+ 0	2.23290+ 6	1.24809+ 0	306	3	2	276
2.28000+ 6	1.27064+ 0	2.45760+ 6	1.35564+ 0	2.50000+ 6	1.37857+ 0	306	3	2	277
2.55140+ 6	1.38807+ 0	2.55140+ 6	1.38807+ 0	2.60200+ 6	1.39743+ 0	306	3	2	278
2.68220+ 6	1.41209+ 0	2.78417+ 6	1.42937+ 0	2.90700+ 6	1.45019+ 0	306	3	2	279
2.97100+ 6	1.45538+ 0	3.00000+ 6	1.45725+ 0	3.13150+ 6	1.46049+ 0	306	3	2	280
3.18464+ 6	1.45760+ 0	3.22331+ 6	1.45370+ 0	3.34000+ 6	1.44193+ 0	306	3	2	281
3.38820+ 6	1.43605+ 0	3.42600+ 6	1.42935+ 0	3.50000+ 6	1.41623+ 0	306	3	2	282
3.52460+ 6	1.41729+ 0	3.59500+ 6	1.41896+ 0	3.64500+ 6	1.42112+ 0	306	3	2	283
3.66700+ 6	1.41975+ 0	3.70910+ 6	1.41685+ 0	3.73850+ 6	1.41469+ 0	306	3	2	284
3.76380+ 6	1.41275+ 0	3.88200+ 6	1.40371+ 0	3.90170+ 6	1.40234+ 0	306	3	2	285
4.00000+ 6	1.37996+ 0	4.02600+ 6	1.37924+ 0	4.09700+ 6	1.37818+ 0	306	3	2	286
4.15840+ 6	1.37808+ 0	4.15931+ 6	1.37800+ 0	4.16900+ 6	1.37715+ 0	306	3	2	287
4.24700+ 6	1.37049+ 0	4.25300+ 6	1.36992+ 0	4.25400+ 6	1.36983+ 0	306	3	2	288
4.25900+ 6	1.36935+ 0	4.26270+ 6	1.36900+ 0	4.27200+ 6	1.36817+ 0	306	3	2	289
4.28400+ 6	1.36704+ 0	4.29700+ 6	1.36581+ 0	4.32200+ 6	1.36335+ 0	306	3	2	290
4.33810+ 6	1.36173+ 0	4.34700+ 6	1.36097+ 0	4.35100+ 6	1.36063+ 0	306	3	2	291
4.39750+ 6	1.35760+ 0	4.42300+ 6	1.35608+ 0	4.44770+ 6	1.35525+ 0	306	3	2	292
4.46500+ 6	1.35469+ 0	4.48000+ 6	1.35448+ 0	4.50000+ 6	1.35411+ 0	306	3	2	293
4.50700+ 6	1.35384+ 0	4.51200+ 6	1.35362+ 0	4.54350+ 6	1.35217+ 0	306	3	2	294
4.55800+ 6	1.35161+ 0	4.57700+ 6	1.35040+ 0	4.60800+ 6	1.34852+ 0	306	3	2	295
4.64200+ 6	1.34576+ 0	4.65900+ 6	1.34451+ 0	4.67400+ 6	1.34320+ 0	306	3	2	296
4.70600+ 6	1.34067+ 0	4.71000+ 6	1.34038+ 0	4.73610+ 6	1.33829+ 0	306	3	2	297
4.74200+ 6	1.33780+ 0	4.77800+ 6	1.33491+ 0	4.81100+ 6	1.33228+ 0	306	3	2	298
4.81400+ 6	1.33207+ 0	4.81630+ 6	1.33190+ 0	4.85000+ 6	1.32944+ 0	306	3	2	299
4.91230+ 6	1.32467+ 0	4.92860+ 6	1.32369+ 0	5.00000+ 6	1.31755+ 0	306	3	2	300
5.01500+ 6	1.31686+ 0	5.10700+ 6	1.31248+ 0	5.18000+ 6	1.30932+ 0	306	3	2	301
5.30100+ 6	1.30395+ 0	5.34500+ 6	1.30202+ 0	5.37000+ 6	1.30091+ 0	306	3	2	302
5.49500+ 6	1.29477+ 0	5.50000+ 6	1.29451+ 0	5.51000+ 6	1.29419+ 0	306	3	2	303
5.64260+ 6	1.28998+ 0	5.64670+ 6	1.28973+ 0	5.68900+ 6	1.28696+ 0	306	3	2	304
5.84000+ 6	1.27669+ 0	5.92340+ 6	1.27108+ 0	5.97600+ 6	1.26736+ 0	306	3	2	305
6.00000+ 6	1.26567+ 0	6.01000+ 6	1.26507+ 0	6.17100+ 6	1.25535+ 0	306	3	2	306
6.26400+ 6	1.24970+ 0	6.35670+ 6	1.24404+ 0	6.50000+ 6	1.23418+ 0	306	3	2	307
6.55100+ 6	1.23067+ 0	6.61394+ 6	1.22630+ 0	6.72570+ 6	1.21746+ 0	306	3	2	308
6.83800+ 6	1.20852+ 0	6.95000+ 6	1.19948+ 0	7.00000+ 6	1.19543+ 0	306	3	2	309
7.07100+ 6	1.19131+ 0	7.34450+ 6	1.17872+ 0	7.52800+ 6	1.17015+ 0	306	3	2	310
7.78470+ 6	1.15765+ 0	7.85100+ 6	1.15510+ 0	8.00000+ 6	1.14933+ 0	306	3	2	311
8.33030+ 6	1.13211+ 0	8.35800+ 6	1.13058+ 0	8.47000+ 6	1.12437+ 0	306	3	2	312
8.64320+ 6	1.11476+ 0	8.86500+ 6	1.10206+ 0	9.00000+ 6	1.09424+ 0	306	3	2	313
9.13260+ 6	1.08587+ 0	9.50160+ 6	1.06159+ 0	1.00000+ 7	1.03012+ 0	306	3	2	314

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 1.03600+ 7 1.01523+ 0 1.05000+ 7 1.01041+ 0 1.09000+ 7 9.96633- 1 306 3  2   315
 1.10000+ 7 9.93156- 1 1.12190+ 7 9.87289- 1 1.13710+ 7 9.83594- 1 306 3  2   316
 1.20000+ 7 9.68024- 1 1.22610+ 7 9.55418- 1 1.28000+ 7 9.29054- 1 306 3  2   317
 1.30000+ 7 9.19203- 1 1.33040+ 7 9.06388- 1 1.36090+ 7 8.95050- 1 306 3  2   318
 1.40000+ 7 8.80685- 1 1.41000+ 7 8.76717- 1 1.43470+ 7 8.66828- 1 306 3  2   319
 1.52000+ 7 8.41919- 1 1.53900+ 7 8.36379- 1 1.55000+ 7 8.33416- 1 306 3  2   320
 1.58480+ 7 8.24044- 1 1.60000+ 7 8.20084- 1 1.65300+ 7 8.02941- 1 306 3  2   321
 1.69670+ 7 7.87233- 1 1.70000+ 7 7.85979- 1 1.76700+ 7 7.60411- 1 306 3  2   322
 1.80000+ 7 7.49674- 1 1.82000+ 7 7.42855- 1 1.88080+ 7 7.21685- 1 306 3  2   323
 1.90000+ 7 7.18165- 1 2.00000+ 7 6.99664- 1                       306 3  2   324
                                                                   306 3  0   325
 3.00600+ 3 5.96345+ 0          0          99          0          0 306 3  3   326
 0.0    + 0 7.25053+ 6          0           0          1        409 306 3  3   327
        409            2          0           0          0          0 306 3  3   328
 1.00000- 5 4.73009+ 4 1.28124- 5 4.17883+ 4 1.56249- 5 3.78408+ 4 306 3  3   329
 2.12498- 5 3.24481+ 4 2.68747- 5 2.88532+ 4 3.24998- 5 2.62377+ 4 306 3  3   330
 4.37497- 5 2.26140+ 4 5.49999- 5 2.01690+ 4 6.62496- 5 1.83769+ 4 306 3  3   331
 7.74997- 5 1.69908+ 4 1.00000- 4 1.49576+ 4 1.28124- 4 1.32144+ 4 306 3  3   332
 1.56249- 4 1.19662+ 4 2.12498- 4 1.02609+ 4 2.68747- 4 9.12417+ 3 306 3  3   333
 3.24998- 4 8.29708+ 3 4.37497- 4 7.15120+ 3 5.49999- 4 6.37803+ 3 306 3  3   334
 6.62496- 4 5.81134+ 3 7.74997- 4 5.37302+ 3 1.00000- 3 4.73009+ 3 306 3  3   335
 1.28124- 3 4.17882+ 3 1.56249- 3 3.78408+ 3 2.12499- 3 3.24481+ 3 306 3  3   336
 2.68748- 3 2.88532+ 3 3.24998- 3 2.62377+ 3 4.37497- 3 2.26140+ 3 306 3  3   337
 5.49999- 3 2.01690+ 3 6.62497- 3 1.83769+ 3 7.74997- 3 1.69908+ 3 306 3  3   338
 1.00000- 2 1.49576+ 3 1.38250- 2 1.27212+ 3 1.76500- 2 1.12587+ 3 306 3  3   339
 2.14750- 2 1.02069+ 3 2.53000- 2 9.40368+ 2 3.46374- 2 8.03682+ 2 306 3  3   340
 4.39748- 2 7.13269+ 2 5.33123- 2 6.47799+ 2 6.26499- 2 5.97576+ 2 306 3  3   341
 8.13247- 2 5.24494+ 2 1.00000- 1 4.72989+ 2 1.28125- 1 4.17859+ 2 306 3  3   342
 1.56250- 1 3.78383+ 2 2.12500- 1 3.24456+ 2 2.68750- 1 2.88507+ 2 306 3  3   343
 3.25000- 1 2.62352+ 2 4.37500- 1 2.26116+ 2 5.50000- 1 2.01667+ 2 306 3  3   344
 6.62499- 1 1.83747+ 2 7.75000- 1 1.69886+ 2 1.00000+ 0 1.49556+ 2 306 3  3   345
 1.28125+ 0 1.32122+ 2 1.56250+ 0 1.19639+ 2 2.12500+ 0 1.02587+ 2 306 3  3   346
 2.68750+ 0 9.12194+ 1 3.25000+ 0 8.29491+ 1 4.37500+ 0 7.14910+ 1 306 3  3   347
 5.50000+ 0 6.37601+ 1 6.62500+ 0 5.80937+ 1 7.75000+ 0 5.37112+ 1 306 3  3   348
 1.00000+ 1 4.72829+ 1 1.28125+ 1 4.17690+ 1 1.56250+ 1 3.78211+ 1 306 3  3   349
 2.12500+ 1 3.24283+ 1 2.68750+ 1 2.88336+ 1 3.25000+ 1 2.62183+ 1 306 3  3   350
 4.37500+ 1 2.25953+ 1 5.50000+ 1 2.01509+ 1 6.62500+ 1 1.83594+ 1 306 3  3   351
 7.75000+ 1 1.69738+ 1 1.00000+ 2 1.49416+ 1 1.28125+ 2 1.31990+ 1 306 3  3   352
 1.56250+ 2 1.19514+ 1 2.12500+ 2 1.02471+ 1 2.68750+ 2 9.11110+ 0 306 3  3   353
 3.25000+ 2 8.28465+ 0 4.37500+ 2 7.13972+ 0 5.50000+ 2 6.36728+ 0 306 3  3   354
 6.62500+ 2 5.80114+ 0 7.75000+ 2 5.36329+ 0 1.00000+ 3 4.72109+ 0 306 3  3   355
 1.28125+ 3 4.17154+ 0 1.56250+ 3 3.77798+ 0 2.00000+ 3 3.33984+ 0 306 3  3   356
 2.12500+ 3 3.24052+ 0 2.68750+ 3 2.88288+ 0 3.00000+ 3 2.72921+ 0 306 3  3   357
 3.25000+ 3 2.62292+ 0 4.00000+ 3 2.36610+ 0 4.37500+ 3 2.26353+ 0 306 3  3   358
 5.00000+ 3 2.11889+ 0 5.50000+ 3 2.02165+ 0 6.00000+ 3 1.93678+ 0 306 3  3   359
 6.62500+ 3 1.84485+ 0 7.00000+ 3 1.79567+ 0 7.75000+ 3 1.70849+ 0 306 3  3   360
 8.00000+ 3 1.68217+ 0 9.00000+ 3 1.58836+ 0 [illegible]000+ 4 1.50936+ 0 306 3  3   361
 1.28125+ 4 1.34209+ 0 1.56250+ 4 1.22162+ [illegible]000+ 4 1.08674+ 0 306 3  3   362
 2.12500+ 4 1.05797+ 0 2.68750+ 4 9.53542- [illegible]5.00000+ 4 9.08235- 1 306 3  3   363
 3.25000+ 4 8.79045- 1 4.00000+ 4 8.07621- 1 4.37500+ 4 7.81424- 1 306 3  3   364
 5.00000+ 4 7.43957- 1 5.50000+ 4 7.21970- 1 6.00000+ 4 7.02465- 1 306 3  3   365
 6.62500+ 4 6.86126- 1 7.00000+ 4 6.76323- 1 7.75000+ 4 6.65402- 1 306 3  3   366
 8.00000+ 4 6.61762- 1 9.00000+ 4 6.57170- 1 1.00000+ 5 6.61899- 1 306 3  3   367
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........10........20........30........40........50........60......MAT MF MT  SEQ
 1.10000+ 5 6.76939- 1 1.20000+ 5 7.04209- 1 1.30000+ 5 7.42709- 1 306 3  3  368
 1.40000+ 5 7.95779- 1 1.50000+ 5 8.96859- 1 1.60000+ 5 1.01472+ 0 306 3  3  369
 1.65000+ 5 1.08842+ 0 1.70000+ 5 1.17392+ 0 1.75000+ 5 1.27302+ 0 306 3  3  370
 1.80000+ 5 1.38752+ 0 1.85000+ 5 1.51922+ 0 1.90000+ 5 1.66982+ 0 306 3  3  371
 1.95000+ 5 1.84032+ 0 2.00000+ 5 2.03062+ 0 2.05000+ 5 2.23862+ 0 306 3  3  372
 2.10000+ 5 2.45952+ 0 2.12500+ 5 2.57212+ 0 2.15000+ 5 2.68472+ 0 306 3  3  373
 2.16000+ 5 2.72922+ 0 2.17000+ 5 2.77332+ 0 2.18000+ 5 2.81682+ 0 306 3  3  374
 2.19000+ 5 2.85962+ 0 2.20000+ 5 2.90162+ 0 2.21000+ 5 2.94262+ 0 306 3  3  375
 2.22000+ 5 2.98242+ 0 2.23000+ 5 3.02102+ 0 2.24000+ 5 3.05832+ 0 306 3  3  376
 2.25000+ 5 3.09392+ 0 2.26000+ 5 3.12792+ 0 2.27000+ 5 3.16002+ 0 306 3  3  377
 2.28000+ 5 3.19022+ 0 2.29000+ 5 3.21832+ 0 2.30000+ 5 3.24422+ 0 306 3  3  378
 2.31000+ 5 3.26782+ 0 2.32000+ 5 3.28902+ 0 2.33000+ 5 3.30772+ 0 306 3  3  379
 2.34000+ 5 3.32382+ 0 2.35000+ 5 3.33722+ 0 2.36000+ 5 3.34802+ 0 306 3  3  380
 2.37000+ 5 3.35612+ 0 2.38000+ 5 3.36142+ 0 2.39000+ 5 3.36402+ 0 306 3  3  381
 2.40000+ 5 3.36382+ 0 2.41000+ 5 3.36242+ 0 2.42000+ 5 3.35782+ 0 306 3  3  382
 2.43000+ 5 3.35012+ 0 2.44000+ 5 3.33932+ 0 2.45000+ 5 3.32552+ 0 306 3  3  383
 2.46000+ 5 3.30882+ 0 2.47000+ 5 3.28932+ 0 2.48000+ 5 3.26722+ 0 306 3  3  384
 2.49000+ 5 3.24252+ 0 2.50000+ 5 3.21552+ 0 2.51000+ 5 3.18632+ 0 306 3  3  385
 2.52000+ 5 3.15512+ 0 2.53000+ 5 3.12202+ 0 2.54000+ 5 3.08732+ 0 306 3  3  386
 2.55000+ 5 3.05102+ 0 2.56000+ 5 3.01332+ 0 2.57000+ 5 2.97442+ 0 306 3  3  387
 2.58000+ 5 2.93462+ 0 2.59000+ 5 2.89382+ 0 2.60000+ 5 2.85232+ 0 306 3  3  388
 2.61000+ 5 2.81022+ 0 2.62000+ 5 2.76772+ 0 2.63000+ 5 2.72482+ 0 306 3  3  389
 2.64000+ 5 2.68172+ 0 2.65000+ 5 2.63862+ 0 2.66000+ 5 2.59542+ 0 306 3  3  390
 2.67000+ 5 2.55242+ 0 2.68000+ 5 2.50952+ 0 2.69000+ 5 2.46692+ 0 306 3  3  391
 2.70000+ 5 2.42472+ 0 2.71000+ 5 2.38282+ 0 2.72000+ 5 2.34142+ 0 306 3  3  392
 2.73000+ 5 2.30052+ 0 2.74000+ 5 2.26022+ 0 2.75000+ 5 2.22042+ 0 306 3  3  393
 2.76000+ 5 2.18132+ 0 2.77000+ 5 2.14282+ 0 2.78000+ 5 2.10502+ 0 306 3  3  394
 2.79000+ 5 2.06792+ 0 2.80000+ 5 2.03152+ 0 2.85000+ 5 1.86022+ 0 306 3  3  395
 2.90000+ 5 1.70712+ 0 2.95000+ 5 1.57132+ 0 3.00000+ 5 1.45132+ 0 306 3  3  396
 3.10000+ 5 1.25242+ 0 3.20000+ 5 1.09752+ 0 3.25000+ 5 1.03666+ 0 306 3  3  397
 3.30000+ 5 9.75798- 1 3.40000+ 5 8.79008- 1 3.50000+ 5 8.00078- 1 306 3  3  398
 3.60000+ 5 7.35758- 1 3.70000+ 5 6.82688- 1 3.80000+ 5 6.38408- 1 306 3  3  399
 3.90000+ 5 6.01068- 1 4.00000+ 5 5.69278- 1 4.10000+ 5 5.41968- 1 306 3  3  400
 4.20000+ 5 5.18308- 1 4.30000+ 5 4.97668- 1 4.40000+ 5 4.79528- 1 306 3  3  401
 4.50000+ 5 4.63478- 1 4.60000+ 5 4.49208- 1 4.70000+ 5 4.36438- 1 306 3  3  402
 4.80000+ 5 4.24967- 1 4.90000+ 5 4.14608- 1 5.00000+ 5 4.05207- 1 306 3  3  403
 5.10000+ 5 3.96647- 1 5.20000+ 5 3.88837- 1 5.30000+ 5 3.81667- 1 306 3  3  404
 5.40000+ 5 3.75067- 1 5.50000+ 5 3.68917- 1 5.60000+ 5 3.63227- 1 306 3  3  405
 5.70000+ 5 3.57957- 1 5.80000+ 5 3.53047- 1 5.90000+ 5 3.48477- 1 306 3  3  406
 6.00000+ 5 3.44207- 1 6.10000+ 5 3.40207- 1 6.20000+ 5 3.36457- 1 306 3  3  407
 6.30000+ 5 3.32937- 1 6.40000+ 5 3.29617- 1 6.50000+ 5 3.26487- 1 306 3  3  408
 6.60000+ 5 3.23537- 1 6.70000+ 5 3.20737- 1 6.80000+ 5 3.18087- 1 306 3  3  409
 6.90000+ 5 3.15577- 1 7.00000+ 5 3.13187- 1 7.10000+ 5 3.10917- 1 306 3  3  410
 7.20000+ 5 3.08747- 1 7.30000+ 5 3.06687- 1 7.40000+ 5 3.04707- 1 306 3  3  411
 7.50000+ 5 3.02817- 1 7.60000+ 5 3.00997- 1 7.70000+ 5 2.99257- 1 306 3  3  412
 7.80000+ 5 2.97577- 1 7.90000+ 5 2.95967- 1 8.00000+ 5 2.94427- 1 306 3  3  413
 8.10000+ 5 2.92937- 1 8.20000+ 5 2.91497- 1 8.30000+ 5 2.90107- 1 306 3  3  414
 8.40000+ 5 2.88767- 1 8.50000+ 5 2.87477- 1 8.60000+ 5 2.86217- 1 306 3  3  415
 8.70000+ 5 2.85007- 1 8.80000+ 5 2.83827- 1 8.90000+ 5 2.82677- 1 306 3  3  416
 9.00000+ 5 2.81567- 1 9.10000+ 5 2.80477- 1 9.20000+ 5 2.79427- 1 306 3  3  417
 9.30000+ 5 2.78397- 1 9.40000+ 5 2.77387- 1 9.50000+ 5 2.76407- 1 306 3  3  418
 9.60000+ 5 2.75447- 1 9.70000+ 5 2.74507- 1 9.80000+ 5 2.73587- 1 306 3  3  419
 9.90000+ 5 2.72677- 1 1.00000+ 6 2.71797- 1 1.05000+ 6 2.67567- 1 306 3  3  420
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 1.10000+ 6 2.63618- 1 1.15000+ 6 2.59868- 1 1.20000+ 6 2.56229- 1 306 3  3  421
 1.25000+ 6 2.52659- 1 1.30000+ 6 2.49100- 1 1.35000+ 6 2.45530- 1 306 3  3  422
 1.40000+ 6 2.41910- 1 1.45000+ 6 2.38251- 1 1.50000+ 6 2.34511- 1 306 3  3  423
 1.55000+ 6 2.30692- 1 1.60000+ 6 2.26802- 1 1.65000+ 6 2.22833- 1 306 3  3  424
 1.70000+ 6 2.18783- 1 1.72057+ 6 2.17089- 1 1.75000+ 6 2.16552- 1 306 3  3  425
 1.80000+ 6 2.15569- 1 2.23290+ 6 2.39103- 1 2.28000+ 6 2.38317- 1 306 3  3  426
 2.50000+ 6 2.34647- 1 2.55140+ 6 2.52080- 1 2.55140+ 6 2.52080- 1 306 3  3  427
 2.60200+ 6 2.69241- 1 2.78417+ 6 3.31398- 1 2.97100+ 6 3.95145- 1 306 3  3  428
 3.00000+ 6 4.05517- 1 3.18464+ 6 4.78934- 1 3.22331+ 6 4.96105- 1 306 3  3  429
 3.34000+ 6 5.47921- 1 3.42600+ 6 5.87943- 1 3.50000+ 6 6.22380- 1 306 3  3  430
 3.52460+ 6 6.28416- 1 3.59500+ 6 6.47028- 1 3.66700+ 6 6.64666- 1 306 3  3  431
 3.70910+ 6 6.75259- 1 3.73850+ 6 6.82790- 1 3.76380+ 6 6.89348- 1 306 3  3  432
 3.88200+ 6 7.19987- 1 4.00000+ 6 7.49789- 1 4.02600+ 6 7.51155- 1 306 3  3  433
 4.09700+ 6 7.53983- 1 4.15931+ 6 7.55644- 1 4.16900+ 6 7.55947- 1 306 3  3  434
 4.24700+ 6 7.58151- 1 4.25300+ 6 7.58370- 1 4.25400+ 6 7.58408- 1 306 3  3  435
 4.25900+ 6 7.58597- 1 4.26270+ 6 7.58742- 1 4.27200+ 6 7.59040- 1 306 3  3  436
 4.28400+ 6 7.59479- 1 4.29700+ 6 7.59968- 1 4.32200+ 6 7.61003- 1 306 3  3  437
 4.33810+ 6 7.61704- 1 4.34700+ 6 7.61957- 1 4.39750+ 6 7.63331- 1 306 3  3  438
 4.42300+ 6 7.63891- 1 4.44770+ 6 7.63781- 1 4.46500+ 6 7.63686- 1 306 3  3  439
 4.48000+ 6 7.63324- 1 4.50000+ 6 7.62935- 1 4.50700+ 6 7.62938- 1 306 3  3  440
 4.51200+ 6 7.62968- 1 4.55800+ 6 7.63346- 1 4.57700+ 6 7.63992- 1 306 3  3  441
 4.60800+ 6 7.64938- 1 4.64200+ 6 7.66671- 1 4.65900+ 6 7.67407- 1 306 3  3  442
 4.67400+ 6 7.68264- 1 4.70600+ 6 7.69833- 1 4.71000+ 6 7.69999- 1 306 3  3  443
 4.74200+ 6 7.71599- 1 4.77800+ 6 7.73269- 1 4.81100+ 6 7.74787- 1 306 3  3  444
 4.81400+ 6 7.74896- 1 4.81630+ 6 7.74987- 1 4.85000+ 6 7.76313- 1 306 3  3  445
 4.91230+ 6 7.78975- 1 5.00000+ 6 7.81279- 1 5.01500+ 6 7.81073- 1 306 3  3  446
 5.10700+ 6 7.79947- 1 5.18000+ 6 7.78743- 1 5.30100+ 6 7.76870- 1 306 3  3  447
 5.34500+ 6 7.76169- 1 5.37000+ 6 7.75784- 1 5.49500+ 6 7.74448- 1 306 3  3  448
 5.50000+ 6 7.74412- 1 5.51000+ 6 7.74138- 1 5.64670+ 6 7.70306- 1 306 3  3  449
 5.68900+ 6 7.69358- 1 5.84000+ 6 7.66377- 1 5.92340+ 6 7.64665- 1 306 3  3  450
 5.97600+ 6 7.63760- 1 6.00000+ 6 7.63342- 1 6.01000+ 6 7.63067- 1 306 3  3  451
 6.17100+ 6 7.58649- 1 6.26400+ 6 7.56137- 1 6.50000+ 6 7.49818- 1 306 3  3  452
 6.55100+ 6 7.48446- 1 6.61394+ 6 7.46803- 1 6.72570+ 6 7.44948- 1 306 3  3  453
 6.83800+ 6 7.43158- 1 6.95000+ 6 7.41482- 1 7.00000+ 6 7.40752- 1 306 3  3  454
 7.34450+ 6 7.27802- 1 7.52800+ 6 7.21022- 1 7.85100+ 6 7.09727- 1 306 3  3  455
 8.00000+ 6 7.04566- 1 8.33030+ 6 6.97543- 1 8.35800+ 6 6.97045- 1 306 3  3  456
 8.47000+ 6 6.95035- 1 8.86500+ 6 6.87967- 1 9.00000+ 6 6.85641- 1 306 3  3  457
 9.13260+ 6 6.84057- 1 1.00000+ 7 6.75958- 1 1.05000+ 7 6.60410- 1 306 3  3  458
 1.09000+ 7 6.47971- 1 1.10000+ 7 6.44895- 1 1.13710+ 7 6.30519- 1 306 3  3  459
 1.20000+ 7 6.06430- 1 1.28000+ 7 5.94630- 1 1.30000+ 7 5.91748- 1 306 3  3  460
 1.36090+ 7 5.78652- 1 1.40000+ 7 5.70074- 1 1.41000+ 7 5.68174- 1 306 3  3  461
 1.52000+ 7 5.47670- 1 1.55000+ 7 5.42065- 1 1.58480+ 7 5.35562- 1 306 3  3  462
 1.60000+ 7 5.32588- 1 1.69670+ 7 5.19760- 1 1.70000+ 7 5.19390- 1 306 3  3  463
 1.80000+ 7 5.08340- 1 1.82000+ 7 5.06443- 1 1.90000+ 7 4.99431- 1 306 3  3  464
 2.00000+ 7 4.90835- 1                                             306 3  3  465
                                                                   306 3  0  466
 3.00600+ 3 5.96345+ 0           0          99           0           0 306 3  4  467
 0.0     + 0-1.47348+ 6           0           0           1          56 306 3  4  468
         56          2           0           0           0           0 306 3  4  469
 1.72057+ 6 0.0     + 0 2.50000+ 6 5.00000- 2 2.55140+ 6 7.15880- 2 306 3  4  470
 2.55140+ 6 7.15879- 2 2.78417+ 6 1.69351- 1 3.00000+ 6 2.60000- 1 306 3  4  471
 3.22331+ 6 3.62722- 1 3.42600+ 6 4.55960- 1 3.50000+ 6 4.90000- 1 306 3  4  472
 3.76380+ 6 5.53312- 1 4.00000+ 6 6.10000- 1 4.15931+ 6 6.16372- 1 306 3  4  473
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 4.24700+ 6 6.20285- 1 4.25300+ 6 6.20601- 1 4.25900+ 6 6.20930- 1 306 3  4   474
 4.27200+ 6 6.21661- 1 4.28400+ 6 6.22392- 1 4.29700+ 6 6.23196- 1 306 3  4   475
 4.32200+ 6 6.24837- 1 4.34700+ 6 6.26533- 1 4.39750+ 6 6.29896- 1 306 3  4   476
 4.42300+ 6 6.31461- 1 4.44770+ 6 6.32838- 1 4.48000+ 6 6.34604- 1 306 3  4   477
 4.50000+ 6 6.35792- 1 4.51200+ 6 6.36745- 1 4.57700+ 6 6.42053- 1 306 3  4   478
 4.64200+ 6 6.47134- 1 4.67400+ 6 6.49391- 1 4.70600+ 6 6.51388- 1 306 3  4   479
 4.74200+ 6 6.53361- 1 4.77800+ 6 6.55204- 1 4.81400+ 6 6.57033- 1 306 3  4   480
 4.85000+ 6 6.58964- 1 5.00000+ 6 6.67513- 1 5.01500+ 6 6.67768- 1 306 3  4   481
 5.18000+ 6 6.70819- 1 5.34500+ 6 6.74037- 1 5.50000+ 6 6.7713.  1 306 3  4   482
 5.51000+ 6 6.77139- 1 5.84000+ 6 6.76906- 1 6.00000+ 6 6.76666- 1 306 3  4   483
 6.17100+ 6 6.74701- 1 6.50000+ 6 6.71064- 1 6.95000+ 6 6.66035- 1 306 3  4   484
 7.00000+ 6 6.65495- 1 8.00000+ 6 6.31695- 1 8.47000+ 6 6.21448- 1 306 3  4   485
 9.00000+ 6 6.09925- 1 1.00000+ 7 5.91183- 1 1.10000+ 7 5.48656- 1 306 3  4   486
 1.20000+ 7 4.97130- 1 1.40000+ 7 4.37623- 1 1.60000+ 7 4.03339- 1 306 3  4   487
 1.80000+ 7 3.84096- 1 2.00000+ 7 3.67975- 1                       306 3  4   488
                                                                   306 3  0   489
 3.00600+ 3 5.96345+ 0          0          99          0          0 306 3 16   490
 0.0    + 0-5.66413+ 6          0           0          1         11 306 3 16   491
         11          2          0           0          0          0 306 3 16   492
 6.61394+ 6 0.0    + 0 8.00000+ 6 1.31924- 2 9.00000+ 6 2.40865- 2 306 3 16   493
 1.00000+ 7 3.72608- 2 1.10000+ 7 5.24620- 2 1.20000+ 7 6.86765- 2 306 3 16   494
 1.30000+ 7 8.66645- 2 1.40000+ 7 9.75586- 2 1.60000+ 7 1.00000- 1 306 3 16   495
 1.80000+ 7 1.00000- 1 2.00000+ 7 1.00000- 1                       306 3 16   496
                                                                   306 3  0   497
 3.00600+ 3 5.96345+ 0          0           1          0          0 306 3 51   498
-1.47348+ 6-2.18500+ 6          0          32          1         17 306 3 51   499
         17          2          0           0          0          0 306 3 51   500
 2.55140+ 6 9.04810- 4 2.78417+ 6 1.04779- 1 3.00000+ 6 1.96830- 1 306 3 51   501
 3.22331+ 6 2.75370- 1 3.42600+ 6 2.95638- 1 3.76380+ 6 3.07461- 1 306 3 51   502
 4.00000+ 6 2.97327- 1 5.00000+ 6 2.48345- 1 6.00000+ 6 1.90919- 1 306 3 51   503
 7.00000+ 6 1.58828- 1 8.00000+ 6 1.37715- 1 1.00000+ 7 1.08157- 1 306 3 51   504
 1.20000+ 7 9.12670- 2 1.40000+ 7 7.69104- 2 1.60000+ 7 6.76209- 2 306 3 51   505
 1.80000+ 7 6.25538- 2 2.00000+ 7 6.00203- 2                       306 3 51   506
                                                                   306 3  0   507
 3.00600+ 3 5.96345+ 0          0           2          0          0 306 3 52   508
 0.0    + 0-3.56200+ 6          0           0          1         37 306 3 52   509
         37          2          0           0          0          0 306 3 52   510
 4.15931+ 6 0.0    + 0 4.24700+ 6 4.05200- 4 4.25300+ 6 4.81600- 4 306 3 52   511
 4.25900+ 6 5.70350- 4 4.27200+ 6 7.81640- 4 4.28400+ 6 1.03250- 3 306 3 52   512
 4.29700+ 6 1.31660- 3 4.32200+ 6 1.95770- 3 4.34700+ 6 2.65300- 3 306 3 52   513
 4.39750+ 6 3.99680- 3 4.42300+ 6 4.54100- 3 4.44770+ 6 4.93040- 3 306 3 52   514
 4.48000+ 6 5.40470- 3 4.51200+ 6 6.02500- 3 4.57700+ 6 7.43340- 3 306 3 52   515
 4.64200+ 6 8.61470- 3 4.67400+ 6 8.95110- 3 4.70600+ 6 9.02800- 3 306 3 52   516
 4.74200+ 6 8.84100- 3 4.77800+ 6 8.52450- 3 4.81400+ 6 8.19370- 3 306 3 52   517
 4.85000+ 6 7.96400- 3 5.01500+ 6 7.46770- 3 5.18000+ 6 7.21950- 3 306 3 52   518
 5.34500+ 6 7.13740- 3 5.51000+ 6 7.13940- 3 5.84000+ 6 6.90570- 3 306 3 52   519
 6.17100+ 6 6.41080- 3 6.50000+ 6 6.06410- 3 6.95000+ 6 5.53466- 3 306 3 52   520
 8.47000+ 6 4.31857- 3 1.00000+ 7 3.18355- 3 1.20000+ 7 2.12960- 3 306 3 52   521
 1.40000+ 7 1.62290- 3 1.60000+ 7 1.33915- 3 1.80000+ 7 1.09593- 3 306 3 52   522
 2.00000+ 7 9.74320- 4                                             306 3 52   523
                                                                   306 3  0   524
 3.00600+ 3 5.96345+ 0          0          98          0          0 306 3 91   525
-1.47348+ 6-1.47348+ 6          0          32          1         25 306 3 91   526
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         25          2          0          0          0          0 306 3 91  527
 1.72057+ 6 0.0     + 0 2.50000+ 6 5.00000- 2 2.55140+ 6 7.15880- 2 306 3 91  528
 2.55140+ 6 7.06831- 2 2.78417+ 6 6.45723- 2 3.00000+ 6 6.31700- 2 306 3 91  529
 3.22331+ 6 8.73526- 2 3.42600+ 6 1.60322- 1 3.50000+ 6 1.91772- 1 306 3 91  530
 3.76380+ 6 2.45851- 1 4.00000+ 6 3.12673- 1 4.50000+ 6 3.57164- 1 306 3 91  531
 5.00000+ 6 4.11655- 1 5.50000+ 6 4.50368- 1 6.00000+ 6 4.79081- 1 306 3 91  532
 7.00000+ 6 5.01172- 1 8.00000+ 6 4.89285- 1 9.00000+ 6 4.83064- 1 306 3 91  533
 1.00000+ 7 4.79843- 1 1.10000+ 7 4.46288- 1 1.20000+ 7 4.03733- 1 306 3 91  534
 1.40000+ 7 3.59090- 1 1.60000+ 7 3.34379- 1 1.80000+ 7 3.20446- 1 306 3 91  535
 2.00000+ 7 3.06980- 1                                             306 3 91  536
                                                                   306 3  0  537
 3.00600+ 3 5.96345+ 0          0         99          0          0 306 3102  538
 0.0     + 0 7.25053+ 6          0          0          1         18 306 3102  539
         18          5          0          0          0          0 306 3102  540
 1.00000- 5 1.93531+ 0 1.00000- 4 6.12000- 1 1.00000- 3 1.93531- 1 306 3102  541
 1.00000- 2 6.12000- 2 2.53000- 2 3.85000- 2 1.00000- 1 1.93531- 2 306 3102  542
 1.00000+ 0 6.12000- 3 1.00000+ 1 1.93531- 3 1.00000+ 2 6.12000- 4 306 3102  543
 1.00000+ 3 1.93531- 4 1.00000+ 4 6.12000- 5 1.00000+ 5 1.93531- 5 306 3102  544
 1.00000+ 6 1.67200- 5 2.28000+ 6 2.81531- 5 6.01000+ 6 6.58964- 5 306 3102  545
 1.05000+ 7 7.60887- 5 1.55000+ 7 8.43545- 5 2.00000+ 7 9.18685- 5 306 3102  546
                                                                   306 3  0  547
 3.00600+ 3 5.96345+ 0          0         99          0          0 306 3103  548
 0.0     + 0-2.72730+ 6          0          0          1         38 306 3103  549
         38          2          0          0          0          0 306 3103  550
 3.18464+ 6 0.0     + 0 3.59500+ 6 1.90490- 2 3.66700+ 6 2.09950- 2 306 3103  551
 3.73850+ 6 2.34010- 2 3.88200+ 6 2.86660- 2 4.02600+ 6 3.29900- 2 306 3103  552
 4.09700+ 6 3.42190- 2 4.16900+ 6 3.45160- 2 4.25400+ 6 3.46110- 2 306 3103  553
 4.33810+ 6 3.46520- 2 4.42300+ 6 3.34080- 2 4.46500+ 6 3.19190- 2 306 3103  554
 4.50700+ 6 2.96470- 2 4.55800+ 6 2.71630- 2 4.60800+ 6 2.60170- 2 306 3103  555
 4.65900+ 6 2.58910- 2 4.71000+ 6 2.64710- 2 4.81100+ 6 2.84840- 2 306 3103  556
 4.91230+ 6 2.95310- 2 5.10700+ 6 2.83370- 2 5.30100+ 6 2.63210- 2 306 3103  557
 5.49500+ 6 2.42190- 2 5.68900+ 6 2.27700- 2 5.97600+ 6 2.13880- 2 306 3103  558
 6.26400+ 6 1.99340- 2 6.55100+ 6 1.85500- 2 6.83800+ 6 1.73920- 2 306 3103  559
 7.34450+ 6 1.58400- 2 7.85100+ 6 1.46160- 2 8.35800+ 6 1.35600- 2 306 3103  560
 8.86500+ 6 1.25130- 2 1.09000+ 7 9.66598- 3 1.28000+ 7 7.63917- 3 306 3103  561
 1.41000+ 7 6.69332- 3 1.52000+ 7 6.28795- 3 1.70000+ 7 5.54479- 3 306 3103  562
 1.90000+ 7 5.07187- 3 2.00000+ 7 5.00431- 3                       306 3103  563
                                                                   306 3  0  564
 3.00600+ 3 5.96345+ 0          0         99          0          0 306 3107  565
 0.0     + 0 4.78385+ 6          0          0          2        221 306 3107  566
         24          5        221          2          0          0 306 3107  567
 1.00000- 5 4.72990+ 4 1.00000- 4 1.49570+ 4 1.00000- 3 4.72990+ 3 306 3107  568
 1.00000- 2 1.49570+ 3 2.53000- 2 9.40330+ 2 1.00000- 1 4.72970+ 2 306 3107  569
 1.00000+ 0 1.49550+ 2 1.00000+ 1 4.72810+ 1 1.00000+ 2 1.49410+ 1 306 3107  570
 1.00000+ 3 4.72090+ 0 2.00000+ 3 3.33970+ 0 3.00000+ 3 2.72910+ 0 306 3107  571
 4.00000+ 3 2.36600+ 0 5.00000+ 3 2.11880+ 0 6.00000+ 3 1.93670+ 0 306 3107  572
 7.00000+ 3 1.79560+ 0 8.00000+ 3 1.68210+ 0 9.00000+ 3 1.58830+ 0 306 3107  573
 1.00000+ 4 1.50930+ 0 2.00000+ 4 1.08670+ 0 3.00000+ 4 9.08200- 1 306 3107  574
 4.00000+ 4 8.07590- 1 5.00000+ 4 7.43930- 1 6.00000+ 4 7.02440- 1 306 3107  575
 7.00000+ 4 6.76300- 1 8.00000+ 4 6.61740- 1 9.00000+ 4 6.57150- 1 306 3107  576
 1.00000+ 5 6.61880- 1 1.10000+ 5 6.76920- 1 1.20000+ 5 7.04190- 1 306 3107  577
 1.30000+ 5 7.42690- 1 1.40000+ 5 7.95760- 1 1.50000+ 5 8.96840- 1 306 3107  578
 1.60000+ 5 1.01470+ 0 1.65000+ 5 1.08840+ 0 1.70000+ 5 1.17390+ 0 306 3107  579
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 2.05000+ 5 2.23860+ 0 2.10000+ 5 2.45950+ 0 2.15000+ 5 2.68470+ 0 306 3107  582
 2.16000+ 5 2.72920+ 0 2.17000+ 5 2.77330+ 0 2.18000+ 5 2.81680+ 0 306 3107  583
 2.19000+ 5 2.85960+ 0 2.20000+ 5 2.90160+ 0 2.21000+ 5 2.94260+ 0 306 3107  584
 2.22000+ 5 2.98240+ 0 2.23000+ 5 3.02100+ 0 2.24000+ 5 3.05830+ 0 306 3107  585
 2.25000+ 5 3.09390+ 0 2.26000+ 5 3.12790+ 0 2.27000+ 5 3.16000+ 0 306 3107  586
 2.28000+ 5 3.19020+ 0 2.29000+ 5 3.21830+ 0 2.30000+ 5 3.24420+ 0 306 3107  587
 2.31000+ 5 3.26780+ 0 2.32000+ 5 3.28900+ 0 2.33000+ 5 3.30770+ 0 306 3107  588
 2.34000+ 5 3.32380+ 0 2.35000+ 5 3.33720+ 0 2.36000+ 5 3.34800+ 0 306 3107  589
 2.37000+ 5 3.35610+ 0 2.38000+ 5 3.36140+ 0 2.39000+ 5 3.36400+ 0 306 3107  590
 2.40000+ 5 3.36380+ 0 2.41000+ 5 3.36240+ 0 2.42000+ 5 3.35780+ 0 306 3107  591
 2.43000+ 5 3.35010+ 0 2.44000+ 5 3.33930+ 0 2.45000+ 5 3.32550+ 0 306 3107  592
 2.46000+ 5 3.30880+ 0 2.47000+ 5 3.28930+ 0 2.48000+ 5 3.26720+ 0 306 3107  593
 2.49000+ 5 3.24250+ 0 2.50000+ 5 3.21550+ 0 2.51000+ 5 3.18630+ 0 306 3107  594
 2.52000+ 5 3.15510+ 0 2.53000+ 5 3.12200+ 0 2.54000+ 5 3.08730+ 0 306 3107  595
 2.55000+ 5 3.05100+ 0 2.56000+ 5 3.01330+ 0 2.57000+ 5 2.97440+ 0 306 3107  596
 2.58000+ 5 2.93460+ 0 2.59000+ 5 2.89380+ 0 2.60000+ 5 2.85230+ 0 306 3107  597
 2.61000+ 5 2.81020+ 0 2.62000+ 5 2.76770+ 0 2.63000+ 5 2.72480+ 0 306 3107  598
 2.64000+ 5 2.68170+ 0 2.65000+ 5 2.63860+ 0 2.66000+ 5 2.59540+ 0 306 3107  599
 2.67000+ 5 2.55240+ 0 2.68000+ 5 2.50950+ 0 2.69000+ 5 2.46690+ 0 306 3107  600
 2.70000+ 5 2.42470+ 0 2.71000+ 5 2.38280+ 0 2.72000+ 5 2.34140+ 0 306 3107  601
 2.73000+ 5 2.30050+ 0 2.74000+ 5 2.26020+ 0 2.75000+ 5 2.22040+ 0 306 3107  602
 2.76000+ 5 2.18130+ 0 2.77000+ 5 2.14280+ 0 2.78000+ 5 2.10500+ 0 306 3107  603
 2.79000+ 5 2.06790+ 0 2.80000+ 5 2.03150+ 0 2.85000+ 5 1.86020+ 0 306 3107  604
 2.90000+ 5 1.70710+ 0 2.95000+ 5 1.57130+ 0 3.00000+ 5 1.45130+ 0 306 3107  605
 3.10000+ 5 1.25240+ 0 3.20000+ 5 1.09750+ 0 3.30000+ 5 9.75780- 1 306 3107  606
 3.40000+ 5 8.78990- 1 3.50000+ 5 8.00060- 1 3.60000+ 5 7.35740- 1 306 3107  607
 3.70000+ 5 6.82670- 1 3.80000+ 5 6.38390- 1 3.90000+ 5 6.01050- 1 306 3107  608
 4.00000+ 5 5.69260- 1 4.10000+ 5 5.41950- 1 4.20000+ 5 5.18290- 1 306 3107  609
 4.30000+ 5 4.97650- 1 4.40000+ 5 4.79510- 1 4.50000+ 5 4.63460- 1 306 3107  610
 4.60000+ 5 4.49190- 1 4.70000+ 5 4.36420- 1 4.80000+ 5 4.24950- 1 306 3107  611
 4.90000+ 5 4.14590- 1 5.00000+ 5 4.05190- 1 5.10000+ 5 3.96630- 1 306 3107  612
 5.20000+ 5 3.88820- 1 5.30000+ 5 3.81650- 1 5.40000+ 5 3.75050- 1 306 3107  613
 5.50000+ 5 3.68900- 1 5.60000+ 5 3.63210- 1 5.70000+ 5 3.57940- 1 306 3107  614
 5.80000+ 5 3.53030- 1 5.90000+ 5 3.48460- 1 6.00000+ 5 3.44190- 1 306 3107  615
 6.10000+ 5 3.40190- 1 6.20000+ 5 3.36440- 1 6.30000+ 5 3.32920- 1 306 3107  616
 6.40000+ 5 3.29600- 1 6.50000+ 5 3.26470- 1 6.60000+ 5 3.23520- 1 306 3107  617
 6.70000+ 5 3.20720- 1 6.80000+ 5 3.18070- 1 6.90000+ 5 3.15560- 1 306 3107  618
 7.00000+ 5 3.13170- 1 7.10000+ 5 3.10900- 1 7.20000+ 5 3.08730- 1 306 3107  619
 7.30000+ 5 3.06670- 1 7.40000+ 5 3.04690- 1 7.50000+ 5 3.02800- 1 306 3107  620
 7.60000+ 5 3.00980- 1 7.70000+ 5 2.99240- 1 7.80000+ 5 2.97560- 1 306 3107  621
 7.90000+ 5 2.95950- 1 8.00000+ 5 2.94410- 1 8.10000+ 5 2.92920- 1 306 3107  622
 8.20000+ 5 2.91480- 1 8.30000+ 5 2.90090- 1 8.40000+ 5 2.88750- 1 306 3107  623
 8.50000+ 5 2.87460- 1 8.60000+ 5 2.86200- 1 8.70000+ 5 2.84990- 1 306 3107  624
 8.80000+ 5 2.83810- 1 8.90000+ 5 2.82660- 1 9.00000+ 5 2.81550- 1 306 3107  625
 9.10000+ 5 2.80460- 1 9.20000+ 5 2.79410- 1 9.30000+ 5 2.78380- 1 306 3107  626
 9.40000+ 5 2.77370- 1 9.50000+ 5 2.76390- 1 9.60000+ 5 2.75430- 1 306 3107  627
 9.70000+ 5 2.74490- 1 9.80000+ 5 2.73570- 1 9.90000+ 5 2.72660- 1 306 3107  628
 1.00000+ 6 2.71780- 1 1.05000+ 6 2.67550- 1 1.10000+ 6 2.63600- 1 306 3107  629
 1.15000+ 6 2.59850- 1 1.20000+ 6 2.56210- 1 1.25000+ 6 2.52640- 1 306 3107  630
 1.30000+ 6 2.49080- 1 1.35000+ 6 2.45510- 1 1.40000+ 6 2.41890- 1 306 3107  631
 1.45000+ 6 2.38230- 1 1.50000+ 6 2.34490- 1 1.55000+ 6 2.30670- 1 306 3107  632
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 1.75000+ 6 2.14640- 1 1.80000+ 6 2.10450- 1 2.23290+ 6 2.06210- 1 306 3107  634
 2.60200+ 6 1.76370- 1 2.97100+ 6 1.47290- 1 3.34000+ 6 1.24270- 1 306 3107  635
 3.52460+ 6 1.16690- 1 3.70910+ 6 1.12620- 1 4.26270+ 6 1.02940- 1 306 3107  636
 4.81630+ 6 8.92370- 2 5.37000+ 6 7.56130- 2 5.64670+ 6 7.01150- 2 306 3107  637
 5.92340+ 6 6.61780- 2 6.72570+ 6 5.74300- 2 7.52800+ 6 4.92080- 2 306 3107  638
 8.33030+ 6 4.25690- 2 9.13260+ 6 3.85720- 2 1.13710+ 7 3.32600- 2 306 3107  639
 1.36090+ 7 2.89640- 2 1.58480+ 7 2.36980- 2 1.69670+ 7 2.00800- 2 306 3107  640
 1.82000+ 7 1.86093- 2 2.00000+ 7 1.77648- 2                       306 3107  641
                                                                   306 3  0  642
 3.00600+ 3 5.96345+ 0           0           0           0           0 306 3251  643
 0.0     + 0 0.0     + 0           0           0           1         191 306 3251  644
        191           2           0           0           0           0 306 3251  645
 1.00000- 5 1.11516- 1 1.00000- 4 1.11516- 1 1.00000- 3 1.11516- 1 306 3251  646
 1.00000- 2 1.11516- 1 2.53000- 2 1.11516- 1 1.00000- 1 1.11516- 1 306 3251  647
 1.00000+ 0 1.11515- 1 1.00000+ 1 1.11509- 1 1.00000+ 2 1.11448- 1 306 3251  648
 1.00000+ 3 1.10835- 1 2.00000+ 3 1.10153- 1 3.00000+ 3 1.09469- 1 306 3251  649
 4.00000+ 3 1.08778- 1 5.00000+ 3 1.08090- 1 6.00000+ 3 1.07393- 1 306 3251  650
 7.00000+ 3 1.06700- 1 8.00000+ 3 1.05983- 1 9.00000+ 3 1.05284- 1 306 3251  651
 1.00000+ 4 1.04554- 1 2.00000+ 4 9.72727- 2 3.00000+ 4 8.89747- 2 306 3251  652
 4.00000+ 4 8.03008- 2 5.00000+ 4 7.13254- 2 6.00000+ 4 6.18616- 2 306 3251  653
 7.00000+ 4 5.19127- 2 8.00000+ 4 4.17139- 2 9.00000+ 4 3.14886- 2 306 3251  654
 1.00000+ 5 2.15949- 2 1.10000+ 5 1.23761- 2 1.20000+ 5 4.39332- 3 306 3251  655
 1.30000+ 5-1.29148- 3 1.40000+ 5-4.20561- 3 1.50000+ 5-3.69706- 3 306 3251  656
 1.60000+ 5 1.47347- 3 1.65000+ 5 5.66600- 3 1.70000+ 5 1.08818- 2 306 3251  657
 1.75000+ 5 1.70369- 2 1.80000+ 5 2.40304- 2 1.85000+ 5 3.17433- 2 306 3251  658
 1.90000+ 5 4.00395- 2 1.95000+ 5 4.87788- 2 2.00000+ 5 5.78206- 2 306 3251  659
 2.05000+ 5 6.70290- 2 2.10000+ 5 7.[illegible]2778- 2 2.15000+ 5 8.54554- 2 306 3251  660
 2.16000+ 5 8.72736- 2 2.17000+ 5 8.90840- 2 2.18000+ 5 9.08875- 2 306 3251  661
 2.19000+ 5 9.26813- 2 2.20000+ 5 9.44660- 2 2.21000+ 5 9.62404- 2 306 3251  662
 2.22000+ 5 9.80049- 2 2.23000+ 5 9.97576- 2 2.24000+ 5 1.01499- 1 306 3251  663
 2.25000+ 5 1.03228- 1 2.26000+ 5 1.04945- 1 2.27000+ 5 1.06650- 1 306 3251  664
 2.28000+ 5 1.08339- 1 2.29000+ 5 1.10016- 1 2.30000+ 5 1.11679- 1 306 3251  665
 2.31000+ 5 1.13327- 1 2.32000+ 5 1.14961- 1 2.33000+ 5 1.16579- 1 306 3251  666
 2.34000+ 5 1.18183- 1 2.35000+ 5 1.19771- 1 2.36000+ 5 1.21342- 1 306 3251  667
 2.37000+ 5 1.22899- 1 2.38000+ 5 1.24438- 1 2.39000+ 5 1.25960- 1 306 3251  668
 2.40000+ 5 1.27468- 1 2.41000+ 5 1.29095- 1 2.42000+ 5 1.30707- 1 306 3251  669
 2.43000+ 5 1.32301- 1 2.44000+ 5 1.33877- 1 2.45000+ 5 1.35435- 1 306 3251  670
 2.46000+ 5 1.36976- 1 2.47000+ 5 1.38498- 1 2.48000+ 5 1.40001- 1 306 3251  671
 2.49000+ 5 1.41487- 1 2.50000+ 5 1.42952- 1 2.51000+ 5 1.44402- 1 306 3251  672
 2.52000+ 5 1.45831- 1 2.53000+ 5 1.47241- 1 2.54000+ 5 1.48634- 1 306 3251  673
 2.55000+ 5 1.50006- 1 2.56000+ 5 1.51360- 1 2.57000+ 5 1.52697- 1 306 3251  674
 2.58000+ 5 1.54013- 1 2.59000+ 5 1.55311- 1 2.60000+ 5 1.56591- 1 306 3251  675
 2.61000+ 5 1.57852- 1 2.62000+ 5 1.59094- 1 2.63000+ 5 1.60317- 1 306 3251  676
 2.64000+ 5 1.61523- 1 2.65000+ 5 1.62710- 1 2.66000+ 5 1.63880- 1 306 3251  677
 2.67000+ 5 1.65030- 1 2.68000+ 5 1.66162- 1 2.69000+ 5 1.67277- 1 306 3251  678
 2.70000+ 5 1.68375- 1 2.71000+ 5 1.69454- 1 2.72000+ 5 1.70517- 1 306 3251  679
 2.73000+ 5 1.71561- 1 2.74000+ 5 1.72589- 1 2.75000+ 5 1.73599- 1 306 3251  680
 2.76000+ 5 1.74594- 1 2.77000+ 5 1.75570- 1 2.78000+ 5 1.76530- 1 306 3251  681
 2.79000+ 5 1.77474- 1 2.80000+ 5 1.78402- 1 2.85000+ 5 1.82804- 1 306 3251  682
 2.90000+ 5 1.86828- 1 2.95000+ 5 1.90495- 1 3.00000+ 5 1.93831- 1 306 3251  683
 3.10000+ 5 1.99590- 1 3.20000+ 5 2.04284- 1 3.30000+ 5 2.08063- 1 306 3251  684
 3.40000+ 5 2.11072- 1 3.50000+ 5 2.13488- 1 3.60000+ 5 2.15338- 1 306 3251  685
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 3.70000+ 5 2.16707- 1 3.80000+ 5 2.17675- 1 3.90000+ 5 2.18311- 1 306 3251  686
 4.00000+ 5 2.18643- 1 4.10000+ 5 2.18730- 1 4.20000+ 5 2.18614- 1 306 3251  687
 4.30000+ 5 2.18312- 1 4.40000+ 5 2.17866- 1 4.50000+ 5 2.17286- 1 306 3251  688
 4.60000+ 5 2.16590- 1 4.70000+ 5 2.15801- 1 4.80000+ 5 2.14937- 1 306 3251  689
 4.90000+ 5 2.13999- 1 5.00000+ 5 2.12997- 1 5.47000+ 5 2.60332- 1 306 3251  690
 5.97000+ 5 2.73624- 1 6.47000+ 5 2.73316- 1 6.97000+ 5 2.64830- 1 306 3251  691
 7.47000+ 5 2.87908- 1 7.96000+ 5 2.98173- 1 8.46000+ 5 2.81410- 1 306 3251  692
 8.96000+ 5 3.13571- 1 9.46000+ 5 3.38246- 1 1.00000+ 6 2.45639- 1 306 3251  693
 1.10000+ 6 2.77667- 1 1.20000+ 6 2.59264- 1 1.33000+ 6 2.13899- 1 306 3251  694
 1.40000+ 6 2.14478- 1 1.50000+ 6 2.03553- 1 1.60000+ 6 2.03530- 1 306 3251  695
 1.70000+ 6 2.06820- 1 1.80000+ 6 1.98834- 1 1.90000+ 6 1.87663- 1 306 3251  696
 2.00000+ 6 1.89192- 1 2.09000+ 6 1.99722- 1 2.19000+ 6 1.85812- 1 306 3251  697
 2.20000+ 6 2.00909- 1 2.30000+ 6 2.00274- 1 2.50000+ 6 1.73436- 1 306 3251  698
 2.60000+ 6 1.69353- 1 2.70000+ 6 1.92974- 1 2.80000+ 6 1.81200- 1 306 3251  699
 2.90000+ 6 1.97760- 1 3.00000+ 6 2.06151- 1 4.08000+ 6 4.07736- 1 306 3251  700
 4.26000+ 6 4.48294- 1 4.57000+ 6 4.90753- 1 4.83000+ 6 5.05136- 1 306 3251  701
 5.05000+ 6 5.24892- 1 5.29000+ 6 5.31484- 1 5.54000+ 6 5.45871- 1 306 3251  702
 5.74000+ 6 5.63665- 1 6.05000+ 6 5.76133- 1 6.37000+ 6 6.05640- 1 306 3251  703
 6.66000+ 6 6.08982- 1 6.94000+ 6 6.34868- 1 7.32000+ 6 6.53158- 1 306 3251  704
 7.47000+ 6 6.45419- 1 8.96000+ 6 6.89609- 1 9.96000+ 6 7.17776- 1 306 3251  705
 1.09500+ 7 7.39642- 1 1.20400+ 7 7.61885- 1 1.29400+ 7 7.73911- 1 306 3251  706
 1.39400+ 7 7.84325- 1 1.40000+ 7 7.90646- 1 1.50000+ 7 8.02899- 1 306 3251  707
 1.60000+ 7 8.13885- 1 1.70000+ 7 8.23753- 1 1.80000+ 7 8.32786- 1 306 3251  708
 1.90000+ 7 8.41021- 1 2.00000+ 7 8.48547- 1                       306 3251  709
                                                                   306 3  0  710
                                                                   306 0  0  711
 3.00600+ 3 5.96345+ 0          1          1          0          0 306 4  2  712
 0.0    + 0 5.96345+ 0          0          2        100          9 306 4  2  713
 1.00000+ 0 1.11792- 1 5.64655- 3 8.39664- 8 0.0    + 0 0.0    + 0 306 4  2  714
 0.0    + 0 0.0    + 0 0.0    + 0 0.0    + 0 0.0    + 0 9.83128- 1 306 4  2  715
 1.99601- 1 1.92792- 2 9.04911- 4 2.03230- 5 5.40321- 8 0.0    + 0 306 4  2  716
 0.0    + 0 0.0    + 0 0.0    + 0-1.09098- 1 9.56151- 1 2.81178- 1 306 4  2  717
 3.97746- 2 3.26396- 3 1.58074- 4 2.15217- 6 0.0    + 0 0.0    + 0 306 4  2  718
 0.0    + 0 1.64323- 2-1.92489- 1 9.15321- 1 3.56754- 1 6.65328- 2 306 4  2  719
 7.60378- 3 5.65296- 4 2.42782- 5-3.91053- 6 0.0    + 0-2.62212- 3 306 4  2  720
 3.69000- 2-2.67232- 1 8.62111- 1 4.25370- 1 9.88523- 2 1.43937- 2 306 4  2  721
 1.42745- 3 9.70165- 5 0.0    + 0 4.27303- 4-6.87658- 3 6.25614- 2 306 4  2  722
-3.34034- 1 7.97704- 1 4.85835- 1 1.35886- 1 2.40194- 2 2.96114- 3 306 4  2  723
 0.0    + 0-7.03334- 5 1.25814- 3-1.33869- 2 9.28313- 2-3.92164- 1 306 4  2  724
 7.23465- 1 5.37018- 1 1.76653- 1 3.67662- 2 0.0    + 0 1.16411- 5 306 4  2  725
-2.27228- 4 2.72397- 3-2.24938- 2 1.26826- 1-4.40725- 1 6.40948- 1 306 4  2  726
 5.77939- 1 2.20066- 1 0.0    + 0-1.93327- 6 4.06444- 5-5.36462- 4 306 4  2  727
 5.04834- 3-3.44167- 2 1.63519- 1-4.78925- 1 5.51869- 1 0.0    + 0 306 4  2  728
 0.0    + 0 3.21779- 7-7.17913- 6 1.03278- 4-1.07821- 3 8.45946- 3 306 4  2  729
-4.92591- 2 2.01790- 1-5.06162- 1 4.58066- 1                       306 4  2  730
 0.0    + 0 0.0    + 0          0          0          1        191 306 4  2  731
        191          2          0          0          0          0 306 4  2  732
 0.0    + 0 1.00000- 5          0          0          4          0 306 4  2  733
-7.03080-12 4.92680-23 4.74280-25-8.86539-36                       306 4  2  734
 0.0    + 0 1.00000- 4          0          0          4          0 306 4  2  735
-6.93199-11 4.93960-21 1.49980-25-2.80350-35                       306 4  2  736
 0.0    + 0 1.00000- 3          0          0          4          0 306 4  2  737
-6.92580-10 4.94120-19 4.74120-26-8.86539-35                       306 4  2  738
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-6.92540- 9 4.94130-17-7.15229-28-2.79670-34                             306 4  2  740
 0.0     + 0 2.53000- 2           0           0           4           0 306 4  2  741
-1.75210- 8 3.16290-16-2.45040-25-4.18150-34                             306 4  2  742
 0.0     + 0 1.00000- 1           0           0           4           0 306 4  2  743
-6.92520- 8 4.94140-15-1.57090-23 5.89220-33                             306 4  2  744
 0.0     + 0 1.00000+ 0           0           0           4           0 306 4  2  745
-6.92460- 7 4.94150-13-1.57140-20 6.77849-29                             306 4  2  746
 0.0     + 0 1.00000+ 1           0           0           4           0 306 4  2  747
-6.92300- 6 4.94210-11-1.57150-17 6.77910-25                             306 4  2  748
 0.0     + 0 1.00000+ 2           0           0           4           0 306 4  2  749
-6.91940- 5 4.94660- 9-1.57230-14 6.78020-21                             306 4  2  750
 0.0     + 0 1.00000+ 3           0           0           4           0 306 4  2  751
-6.92220- 4 4.98710- 7-1.57870-11 6.78410-17                             306 4  2  752
 0.0     + 0 2.00000+ 3           0           0           4           0 306 4  2  753
-1.38610- 3 2.01020- 6-1.26770-10 1.08590-15                             306 4  2  754
 0.0     + 0 3.00000+ 3           0           0           4           0 306 4  2  755
-2.08130- 3 4.55300- 6-4.29220-10 5.49890-15                             306 4  2  756
 0.0     + 0 4.00000+ 3           0           0           4           0 306 4  2  757
-2.78300- 3 8.17410- 6-1.02220- 9 1.73840-14                             306 4  2  758
 0.0     + 0 5.00000+ 3           0           0           4           0 306 4  2  759
-3.48200- 3 1.28460- 5-2.00190- 9 4.24510-14                             306 4  2  760
 0.0     + 0 6.00000+ 3           0           0           4           0 306 4  2  761
-4.19110- 3 1.86810- 5-3.47540- 9 8.80380-14                             306 4  2  762
 0.0     + 0 7.00000+ 3           0           0           4           0 306 4  2  763
-4.89480- 3 2.55730- 5-5.53180- 9 1.35860-13                             306 4  2  764
 0.0     + 0 8.00000+ 3           0           0           4           0 306 4  2  765
-5.62300- 3 3.38690- 5-8.26320- 9-5.13170-13                             306 4  2  766
 0.0     + 0 9.00000+ 3           0           0           4           0 306 4  2  767
-6.33310- 3 4.31130- 5-1.17980- 8-8.25290-13                             306 4  2  768
 0.0     + 0 1.00000+ 4           0           0           4           0 306 4  2  769
-7.07380- 3 5.39740- 5-1.62890- 8-1.27000-12                             306 4  2  770
 0.0     + 0 2.00000+ 4           0           0           4           0 306 4  2  771
-1.44590- 2 2.33100- 4-1.35040- 7-2.14070-11                             306 4  2  772
 0.0     + 0 3.00000+ 4           0           0           4           0 306 4  2  773
-2.28570- 2 6.03130- 4-4.85880- 7-1.18820-10                             306 4  2  774
 0.0     + 0 4.00000+ 4           0           0           4           0 306 4  2  775
-3.16120- 2 1.19710- 3-1.20950- 6-4.02750-10                             306 4  2  776
 0.0     + 0 5.00000+ 4           0           0           4           0 306 4  2  777
-4.06440- 2 2.06020- 3-2.46170- 6-1.04320- 9                             306 4  2  778
 0.0     + 0 6.00000+ 4           0           0           4           0 306 4  2  779
-5.01330- 2 3.28000- 3-4.43190- 6-2.29440- 9                             306 4  2  780
 0.0     + 0 7.00000+ 4           0           0           4           0 306 4  2  781
-6.00640- 2 4.96020- 3-7.33030- 6-4.50840- 9                             306 4  2  782
 0.0     + 0 8.00000+ 4           0           0           4           0 306 4  2  783
-7.01880- 2 7.19580- 3-1.13580- 5-8.12540- 9                             306 4  2  784
 0.0     + 0 9.00000+ 4           0           0           4           0 306 4  2  785
-8.02640- 2 1.01050- 2-1.67090- 5-1.36790- 8                             306 4  2  786
 0.0     + 0 1.00000+ 5           0           0           4           0 306 4  2  787
-8.99160- 2 1.37980- 2-2.35220- 5-2.17530- 8                             306 4  2  788
 0.0     + 0 1.10000+ 5           0           0           4           0 306 4  2  789
-9.87770- 2 1.84380- 2-3.18850- 5-3.29680- 8                             306 4  2  790
 0.0     + 0 1.20000+ 5           0           0           4           0 306 4  2  791
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-1.06260- 1 2.41740- 2-4.17320- 5-4.78340- 8                        306 4  2  792
 0.0    + 0 1.30000+ 5          0          0          4          0 306 4  2  793
-1.11310- 1 3.07690- 2-5.25970- 5-6.62700- 8                        306 4  2  794
 0.0    + 0 1.40000+ 5          0          0          4          0 306 4  2  795
-1.13450- 1 3.81960- 2-6.39760- 5-8.79930- 8                        306 4  2  796
 0.0    + 0 1.50000+ 5          0          0          4          0 306 4  2  797
-1.11830- 1 4.81330- 2-7.51840- 5-1.12720- 7                        306 4  2  798
 0.0    + 0 1.60000+ 5          0          0          4          0 306 4  2  799
-1.05540- 1 5.74140- 2-8.43700- 5-1.36660- 7                        306 4  2  800
 0.0    + 0 1.65000+ 5          0          0          4          0 306 4  2  801
-1.00760- 1 6.20560- 2-8.79350- 5-1.47750- 7                        306 4  2  802
 0.0    + 0 1.70000+ 5          0          0          4          0 306 4  2  803
-9.49470- 2 6.66180- 2-9.06300- 5-1.57740- 7                        306 4  2  804
 0.0    + 0 1.75000+ 5          0          0          4          0 306 4  2  805
-8.81940- 2 7.10410- 2-9.23390- 5-1.66270- 7                        306 4  2  806
 0.0    + 0 1.80000+ 5          0          0          4          0 306 4  2  807
-8.06100- 2 7.52670- 2-9.29700- 5-1.72960- 7                        306 4  2  808
 0.0    + 0 1.85000+ 5          0          0          4          0 306 4  2  809
-7.23210- 2 7.92510- 2-9.24590- 5-1.77460- 7                        306 4  2  810
 0.0    + 0 1.90000+ 5          0          0          4          0 306 4  2  811
-6.34700- 2 8.29510- 2-9.07680- 5-1.79480- 7                        306 4  2  812
 0.0    + 0 1.95000+ 5          0          0          4          0 306 4  2  813
-5.42030- 2 8.63380- 2-8.78880- 5-1.78760- 7                        306 4  2  814
 0.0    + 0 2.00000+ 5          0          0          4          0 306 4  2  815
-4.46650- 2 8.93920- 2-8.38390- 5-1.75070- 7                        306 4  2  816
 0.0    + 0 2.05000+ 5          0          0          4          0 306 4  2  817
-3.49960- 2 9.21020- 2-7.86610- 5-1.68280- 7                        306 4  2  818
 0.0    + 0 2.10000+ 5          0          0          4          0 306 4  2  819
-2.53240- 2 9.44680- 2-7.24120- 5-1.58260- 7                        306 4  2  820
 0.0    + 0 2.15000+ 5          0          0          4          0 306 4  2  821
-1.57620- 2 9.64950- 2-6.51660- 5-1.44970- 7                        306 4  2  822
 0.0    + 0 2.16000+ 5          0          0          4          0 306 4  2  823
-1.38710- 2 9.68620- 2-6.36040- 5-1.41910- 7                        306 4  2  824
 0.0    + 0 2.17000+ 5          0          0          4          0 306 4  2  825
-1.19900- 2 9.72150- 2-6.20060- 5-1.38720- 7                        306 4  2  826
 0.0    + 0 2.18000+ 5          0          0          4          0 306 4  2  827
-1.01180- 2 9.75550- 2-6.03730- 5-1.35410- 7                        306 4  2  828
 0.0    + 0 2.19000+ 5          0          0          4          0 306 4  2  829
-8.25660- 3 9.78830- 2-5.87050- 5-1.31950- 7                        306 4  2  830
 0.0    + 0 2.20000+ 5          0          0          4          0 306 4  2  831
-6.40600- 3 9.81990- 2-5.70040- 5-1.28370- 7                        306 4  2  832
 0.0    + 0 2.21000+ 5          0          0          4          0 306 4  2  833
-4.56700- 3 9.85020- 2-5.52690- 5-1.24660- 7                        306 4  2  834
 0.0    + 0 2.22000+ 5          0          0          4          0 306 4  2  835
-2.74000- 3 9.87930- 2-5.35020- 5-1.20810- 7                        306 4  2  836
 0.0    + 0 2.23000+ 5          0          0          4          0 306 4  2  837
-9.25610- 4 9.90720- 2-5.17030- 5-1.16830- 7                        306 4  2  838
 0.0    + 0 2.24000+ 5          0          0          4          0 306 4  2  839
 8.75720- 4 9.93400- 2-4.98730- 5-1.12720- 7                        306 4  2  840
 0.0    + 0 2.25000+ 5          0          0          4          0 306 4  2  841
 2.66350- 3 9.95960- 2-4.80120- 5-1.08480- 7                        306 4  2  842
 0.0    + 0 2.26000+ 5          0          0          4          0 306 4  2  843
 4.43730- 3 9.98400- 2-4.61220- 5-1.04110- 7                        306 4  2  844
```

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........10........20........30........40........50........60......MAT MF MT  SEQ
 0.0     + 0 2.27000+ 5           0           0           4           0 306 4  2  845
6.19660- 3 1.00070- 1-4.42030- 5-9.96100- 8                             306 4  2  846
 0.0     + 0 2.28000+ 5           0           0           4           0 306 4  2  847
7.94110- 3 1.00300- 1-4.22550- 5-9.49800- 8                             306 4  2  848
 0.0     + 0 2.29000+ 5           0           0           4           0 306 4  2  849
9.67050- 3 1.00510- 1-4.02810- 5-9.02200- 8                             306 4  2  850
 0.0     + 0 2.30000+ 5           0           0           4           0 306 4  2  851
1.13840- 2 1.00710- 1-3.82790- 5-8.53320- 8                             306 4  2  852
 0.0     + 0 2.31000+ 5           0           0           4           0 306 4  2  853
1.30820- 2 1.00900- 1-3.62500- 5-8.03150- 8                             306 4  2  854
 0.0     + 0 2.32000+ 5           0           0           4           0 306 4  2  855
1.47640- 2 1.01080- 1-3.41970- 5-7.51710- 8                             306 4  2  856
 0.0     + 0 2.33000+ 5           0           0           4           0 306 4  2  857
1.64290- 2 1.01250- 1-3.21180- 5-6.98990- 8                             306 4  2  858
 0.0     + 0 2.34000+ 5           0           0           4           0 306 4  2  859
1.80780- 2 1.01410- 1-3.00150- 5-6.45000- 8                             306 4  2  860
 0.0     + 0 2.35000+ 5           0           0           4           0 306 4  2  861
1.97100- 2 1.01560- 1-2.78890- 5-5.89750- 8                             306 4  2  862
 0.0     + 0 2.36000+ 5           0           0           4           0 306 4  2  863
2.13240- 2 1.01700- 1-2.57390- 5-5.33240- 8                             306 4  2  864
 0.0     + 0 2.37000+ 5           0           0           4           0 306 4  2  865
2.29220- 2 1.01830- 1-2.35670- 5-4.75470- 8                             306 4  2  866
 0.0     + 0 2.38000+ 5           0           0           4           0 306 4  2  867
2.45010- 2 1.01950- 1-2.13740- 5-4.16460- 8                             306 4  2  868
 0.0     + 0 2.39000+ 5           0           0           4           0 306 4  2  869
2.60630- 2 1.02070- 1-1.91590- 5-3.56210- 8                             306 4  2  870
 0.0     + 0 2.40000+ 5           0           0           4           0 306 4  2  871
2.76080- 2 1.02170- 1-1.69240- 5-2.94720- 8                             306 4  2  872
 0.0     + 0 2.41000+ 5           0           0           4           0 306 4  2  873
2.92760- 2 1.02280- 1-1.44370- 5-2.25650- 8                             306 4  2  874
 0.0     + 0 2.42000+ 5           0           0           4           0 306 4  2  875
3.09260- 2 1.02380- 1-1.19270- 5-1.55160- 8                             306 4  2  876
 0.0     + 0 2.43000+ 5           0           0           4           0 306 4  2  877
3.25570- 2 1.02460- 1-9.39410- 6-8.32560- 9                             306 4  2  878
 0.0     + 0 2.44000+ 5           0           0           4           0 306 4  2  879
3.41690- 2 1.02540- 1-6.83910- 6-9.94610-10                             306 4  2  880
 0.0     + 0 2.45000+ 5           0           0           4           0 306 4  2  881
3.57620- 2 1.02610- 1-4.26270- 6 6.47630- 9                             306 4  2  882
 0.0     + 0 2.46000+ 5           0           0           4           0 306 4  2  883
3.73360- 2 1.02670- 1-1.66560- 6 1.40860- 8                             306 4  2  884
 0.0     + 0 2.47000+ 5           0           0           4           0 306 4  2  885
3.88900- 2 1.02720- 1 9.51320- 7 2.18340- 8                             306 4  2  886
 0.0     + 0 2.48000+ 5           0           0           4           0 306 4  2  887
4.04240- 2 1.02770- 1 3.58750- 6 2.97200- 8                             306 4  2  888
 0.0     + 0 2.49000+ 5           0           0           4           0 306 4  2  889
4.19390- 2 1.02800- 1 6.24240- 6 3.77420- 8                             306 4  2  890
 0.0     + 0 2.50000+ 5           0           0           4           0 306 4  2  891
4.34330- 2 1.02830- 1 8.91510- 6 4.59000- 8                             306 4  2  892
 0.0     + 0 2.51000+ 5           0           0           4           0 306 4  2  893
4.49090- 2 1.02840- 1 1.16050- 5 5.41930- 8                             306 4  2  894
 0.0     + 0 2.52000+ 5           0           0           4           0 306 4  2  895
4.63640- 2 1.02850- 1 1.43120- 5 6.26200- 8                             306 4  2  896
 0.0     + 0 2.53000+ 5           0           0           4           0 306 4  2  897
```

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........10........20........30........40........50........60......MAT MF MT  SEQ
 4.77990- 2 1.02860- 1 1.70350- 5 7.11810- 8                      306 4  2  898
 0.0    + 0 2.54000+ 5          0          0          4         0 306 4  2  899
 4.92150- 2 1.02850- 1 1.97730- 5 7.98740- 8                      306 4  2  900
 0.0    + 0 2.55000+ 5          0          0          4         0 306 4  2  901
 5.06100- 2 1.02840- 1 2.25260- 5 8.86990- 8                      306 4  2  902
 0.0    + 0 2.56000+ 5          0          0          4         0 306 4  2  903
 5.19860- 2 1.02830- 1 2.52940- 5 9.76550- 8                      306 4  2  904
 0.0    + 0 2.57000+ 5          0          0          4         0 306 4  2  905
 5.33420- 2 1.02800- 1 2.80750- 5 1.06740- 7                      306 4  2  906
 0.0    + 0 2.58000+ 5          0          0          4         0 306 4  2  907
 5.46780- 2 1.02770- 1 3.08690- 5 1.15960- 7                      306 4  2  908
 0.0    + 0 2.59000+ 5          0          0          4         0 306 4  2  909
 5.59940- 2 1.02730- 1 3.36770- 5 1.25300- 7                      306 4  2  910
 0.0    + 0 2.60000+ 5          0          0          4         0 306 4  2  911
 5.72910- 2 1.02690- 1 3.64960- 5 1.34770- 7                      306 4  2  912
 0.0    + 0 2.61000+ 5          0          0          4         0 306 4  2  913
 5.85680- 2 1.02640- 1 3.93270- 5 1.44370- 7                      306 4  2  914
 0.0    + 0 2.62000+ 5          0          0          4         0 306 4  2  915
 5.98260- 2 1.02590- 1 4.21700- 5 1.54100- 7                      306 4  2  916
 0.0    + 0 2.63000+ 5          0          0          4         0 306 4  2  917
 6.10640- 2 1.02530- 1 4.50230- 5 1.63950- 7                      306 4  2  918
 0.0    + 0 2.64000+ 5          0          0          4         0 306 4  2  919
 6.22830- 2 1.02460- 1 4.78860- 5 1.73930- 7                      306 4  2  920
 0.0    + 0 2.65000+ 5          0          0          4         0 306 4  2  921
 6.34820- 2 1.02390- 1 5.07590- 5 1.84030- 7                      306 4  2  922
 0.0    + 0 2.66000+ 5          0          0          4         0 306 4  2  923
 6.46630- 2 1.02310- 1 5.36420- 5 1.94260- 7                      306 4  2  924
 0.0    + 0 2.67000+ 5          0          0          4         0 306 4  2  925
 6.58240- 2 1.02230- 1 5.65340- 5 2.04610- 7                      306 4  2  926
 0.0    + 0 2.68000+ 5          0          0          4         0 306 4  2  927
 6.69670- 2 1.02150- 1 5.94340- 5 2.15090- 7                      306 4  2  928
 0.0    + 0 2.69000+ 5          0          0          4         0 306 4  2  929
 6.80910- 2 1.02060- 1 6.23430- 5 2.25680- 7                      306 4  2  930
 0.0    + 0 2.70000+ 5          0          0          4         0 306 4  2  931
 6.91970- 2 1.01960- 1 6.52590- 5 2.36400- 7                      306 4  2  932
 0.0    + 0 2.71000+ 5          0          0          4         0 306 4  2  933
 7.02840- 2 1.01860- 1 6.81830- 5 2.47240- 7                      306 4  2  934
 0.0    + 0 2.72000+ 5          0          0          4         0 306 4  2  935
 7.13530- 2 1.01760- 1 7.11140- 5 2.58190- 7                      306 4  2  936
 0.0    + 0 2.73000+ 5          0          0          4         0 306 4  2  937
 7.24040- 2 1.01660- 1 7.40520- 5 2.69270- 7                      306 4  2  938
 0.0    + 0 2.74000+ 5          0          0          4         0 306 4  2  939
 7.34370- 2 1.01540- 1 7.69960- 5 2.80470- 7                      306 4  2  940
 0.0    + 0 2.75000+ 5          0          0          4         0 306 4  2  941
 7.44520- 2 1.01430- 1 7.99470- 5 2.91790- 7                      306 4  2  942
 0.0    + 0 2.76000+ 5          0          0          4         0 306 4  2  943
 7.54500- 2 1.01310- 1 8.29030- 5 3.03230- 7                      306 4  2  944
 0.0    + 0 2.77000+ 5          0          0          4         0 306 4  2  945
 7.64300- 2 1.01190- 1 8.58650- 5 3.14780- 7                      306 4  2  946
 0.0    + 0 2.78000+ 5          0          0          4         0 306 4  2  947
 7.73930- 2 1.01070- 1 8.88330- 5 3.26460- 7                      306 4  2  948
 0.0    + 0 2.79000+ 5          0          0          4         0 306 4  2  949
 7.83390- 2 1.00940- 1 9.18050- 5 3.38250- 7                      306 4  2  950
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........10........20........30........40........50........60......MAT MF MT  SEQ
 0.0    + 0 2.80000+ 5           0           0           4           0 306 4  2  951
7.92680- 2 1.00810- 1 9.47820- 5 3.50150- 7                           306 4  2  952
 0.0    + 0 2.85000+ 5           0           0           4           0 306 4  2  953
8.36690- 2 1.00120- 1 1.09730- 4 4.11440- 7                           306 4  2  954
 0.0    + 0 2.90000+ 5           0           0           4           0 306 4  2  955
8.76790- 2 9.93780- 2 1.24770- 4 4.75610- 7                           306 4  2  956
 0.0    + 0 2.95000+ 5           0           0           4           0 306 4  2  957
9.13210- 2 9.85890- 2 1.39870- 4 5.42630- 7                           306 4  2  958
 0.0    + 0 3.00000+ 5           0           0           4           0 306 4  2  959
9.46220- 2 9.77670- 2 1.55010- 4 6.12500- 7                           306 4  2  960
 0.0    + 0 3.10000+ 5           0           0           4           0 306 4  2  961
1.00290- 1 9.60610- 2 1.85400- 4 7.60760- 7                           306 4  2  962
 0.0    + 0 3.20000+ 5           0           0           4           0 306 4  2  963
1.04870- 1 9.43190- 2 2.15850- 4 9.20450- 7                           306 4  2  964
 0.0    + 0 3.30000+ 5           0           0           4           0 306 4  2  965
1.08520- 1 9.25840- 2 2.46360- 4 1.09170- 6                           306 4  2  966
 0.0    + 0 3.40000+ 5           0           0           4           0 306 4  2  967
1.11390- 1 9.08860- 2 2.76900- 4 1.27490- 6                           306 4  2  968
 0.0    + 0 3.50000+ 5           0           0           4           0 306 4  2  969
1.13660- 1 8.92050- 2 3.07780- 4 1.47180- 6                           306 4  2  970
 0.0    + 0 3.60000+ 5           0           0           4           0 306 4  2  971
1.15360- 1 8.75870- 2 3.38740- 4 1.68150- 6                           306 4  2  972
 0.0    + 0 3.70000+ 5           0           0           4           0 306 4  2  973
1.16580- 1 8.60420- 2 3.69800- 4 1.90450- 6                           306 4  2  974
 0.0    + 0 3.80000+ 5           0           0           4           0 306 4  2  975
1.17400- 1 8.45720- 2 4.01000- 4 2.14120- 6                           306 4  2  976
 0.0    + 0 3.90000+ 5           0           0           4           0 306 4  2  977
1.17890- 1 8.31790- 2 4.32370- 4 2.39220- 6                           306 4  2  978
 0.0    + 0 4.00000+ 5           0           0           4           0 306 4  2  979
1.18080- 1 8.18630- 2 4.63930- 4 2.65790- 6                           306 4  2  980
 0.0    + 0 4.10000+ 5           0           0           4           0 306 4  2  981
1.18030- 1 8.06220- 2 4.95710- 4 2.93900- 6                           306 4  2  982
 0.0    + 0 4.20000+ 5           0           0           4           0 306 4  2  983
1.17780- 1 7.94530- 2 5.27740- 4 3.23590- 6                           306 4  2  984
 0.0    + 0 4.30000+ 5           0           0           4           0 306 4  2  985
1.17350- 1 7.83530- 2 5.60040- 4 3.54930- 6                           306 4  2  986
 0.0    + 0 4.40000+ 5           0           0           4           0 306 4  2  987
1.16780- 1 7.73180- 2 5.92640- 4 3.87970- 6                           306 4  2  988
 0.0    + 0 4.50000+ 5           0           0           4           0 306 4  2  989
1.16080- 1 7.63440- 2 6.25550- 4 4.22780- 6                           306 4  2  990
 0.0    + 0 4.60000+ 5           0           0           4           0 306 4  2  991
1.15270- 1 7.54290- 2 6.58790- 4 4.59400- 6                           306 4  2  992
 0.0    + 0 4.70000+ 5           0           0           4           0 306 4  2  993
1.14370- 1 7.45680- 2 6.92390- 4 4.97910- 6                           306 4  2  994
 0.0    + 0 4.80000+ 5           0           0           4           0 306 4  2  995
1.13400- 1 7.37580- 2 7.26350- 4 5.38360- 6                           306 4  2  996
 0.0    + 0 4.90000+ 5           0           0           4           0 306 4  2  997
1.12360- 1 7.29950- 2 7.60680- 4 5.80820- 6                           306 4  2  998
 0.0    + 0 5.00000+ 5           0           0           4           0 306 4  2  999
1.11260- 1 7.22760- 2 7.95410- 4 6.25340- 6                           306 4  2 1000
 0.0    + 0 5.47000+ 5           0           0           2           0 306 4  2 1001
1.56700- 1 4.79000- 2                                                 306 4  2 1002
 0.0    + 0 5.97000+ 5           0           0           2           0 306 4  2 1003
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........10........20........30........40........50........60......MAT MF MT  SEQ
 1.70700- 1 5.22000- 2                                              306 4  2 1004
 0.0     + 0 6.47000+ 5          0          0          2          0 306 4  2 1005
 1.69000- 1 3.98000- 2                                              306 4  2 1006
 0.0     + 0 6.97000+ 5          0          0          2          0 306 4  2 1007
 1.60000- 1 3.65000- 2                                              306 4  2 1008
 0.0     + 0 7.47000+ 5          0          0          2          0 306 4  2 1009
 1.83000- 1 3.23000- 2                                              306 4  2 1010
 0.0     + 0 7.96000+ 5          0          0          2          0 306 4  2 1011
 1.94000- 1 3.73000- 2                                              306 4  2 1012
 0.0     + 0 8.46000+ 5          0          0          2          0 306 4  2 1013
 1.76000- 1 2.88000- 2                                              306 4  2 1014
 0.0     + 0 8.96000+ 5          0          0          2          0 306 4  2 1015
 2.08000- 1 2.25000- 2                                              306 4  2 1016
 0.0     + 0 9.46000+ 5          0          0          2          0 306 4  2 1017
 2.33000- 1 2.17000- 2                                              306 4  2 1018
 0.0     + 0 1.00000+ 6          0          0          2          0 306 4  2 1019
 1.40000- 1 3.22000- 2                                              306 4  2 1020
 0.0     + 0 1.10000+ 6          0          0          2          0 306 4  2 1021
 1.70000- 1 9.22000- 3                                              306 4  2 1022
 0.0     + 0 1.20000+ 6          0          0          2          0 306 4  2 1023
 1.52000- 1 1.56000- 2                                              306 4  2 1024
 0.0     + 0 1.33000+ 6          0          0          2          0 306 4  2 1025
 1.05000- 1 7.87000- 3                                              306 4  2 1026
 0.0     + 0 1.40000+ 6          0          0          2          0 306 4  2 1027
 1.07000- 1 2.05000- 2                                              306 4  2 1028
 0.0     + 0 1.50000+ 6          0          0          2          0 306 4  2 1029
 9.36000- 2 0.0     + 0                                              306 4  2 1030
 0.0     + 0 1.60000+ 6          0          0          4          0 306 4  2 1031
 9.44000- 2 7.22000- 3 1.84000- 3 8.58000- 3                        306 4  2 1032
 0.0     + 0 1.70000+ 6          0          0          4          0 306 4  2 1033
 9.77000- 2 4.88000- 3-1.05000- 2 0.0     + 0                      306 4  2 1034
 0.0     + 0 1.80000+ 6          0          0          4          0 306 4  2 1035
 8.89000- 2 0.0     + 0-3.63000- 3 2.82000- 3                        306 4  2 1036
 0.0     + 0 1.90000+ 6          0          0          4          0 306 4  2 1037
 7.85000- 2 9.42000- 3 0.0     + 0 1.31000- 3                        306 4  2 1038
 0.0     + 0 2.00000+ 6          0          0          4          0 306 4  2 1039
 8.12000- 2 1.99000- 2 0.0     + 0-2.46000- 3                        306 4  2 1040
 0.0     + 0 2.09000+ 6          0          0          4          0 306 4  2 1041
 9.40000- 2 3.97000- 2 7.46000- 3 3.48000- 3                        306 4  2 1042
 0.0     + 0 2.19000+ 6          0          0          4          0 306 4  2 1043
 7.98000- 2 3.79000- 2 1.42000- 3 6.65000- 3                        306 4  2 1044
 0.0     + 0 2.20000+ 6          0          0          4          0 306 4  2 1045
 9.50000- 2 3.67000- 2 1.45000- 3 3.39000- 3                        306 4  2 1046
 0.0     + 0 2.30000+ 6          0          0          4          0 306 4  2 1047
 9.52000- 2 4.57000- 2 8.16000- 3 1.06000- 3                        306 4  2 1048
 0.0     + 0 2.50000+ 6          0          0          4          0 306 4  2 1049
 6.95000- 2 5.96000- 2 8.51000- 3 8.83000- 3                        306 4  2 1050
 0.0     + 0 2.60000+ 6          0          0          4          0 306 4  2 1051
 6.72000- 2 7.68000- 2 1.51000- 2 1.92000- 2                        306 4  2 1052
 0.0     + 0 2.70000+ 6          0          0          4          0 306 4  2 1053
 9.09000- 2 7.71000- 2 3.09000- 2 1.36000- 2                        306 4  2 1054
 0.0     + 0 2.80000+ 6          0          0          4          0 306 4  2 1055
 8.00000- 2 8.48000- 2 2.24000- 2 1.95000- 2                        306 4  2 1056
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........10........20........30........40........50........60......MAT MF MT  SEQ
 0.0     + 0 2.90000+ 6           0           0           4           0 306 4  2 1057
 9.92000- 2 1.07000- 1 2.62000- 2 1.26000- 2                           306 4  2 1058
 0.0     + 0 3.00000+ 6           0           0           4           0 306 4  2 1059
 1.09000- 1 1.19000- 1 3.29000- 2 2.03000- 2                           306 4  2 1060
 0.0     + 0 4.08000+ 6           0           0           4           0 306 4  2 1061
 3.25031- 1 2.20321- 1 5.46361- 2 2.69392- 2                           306 4  2 1062
 0.0     + 0 4.26000+ 6           0           0           4           0 306 4  2 1063
 3.69424- 1 2.50653- 1 7.02279- 2 3.14479- 2                           306 4  2 1064
 0.0     + 0 4.57000+ 6           0           0           4           0 306 4  2 1065
 4.14169- 1 2.66214- 1 7.75744- 2 2.67404- 2                           306 4  2 1066
 0.0     + 0 4.83000+ 6           0           0           4           0 306 4  2 1067
 4.30382- 1 2.82782- 1 9.88550- 2 4.21754- 2                           306 4  2 1068
 0.0     + 0 5.05000+ 6           0           0           4           0 306 4  2 1069
 4.52288- 1 3.00451- 1 1.07227- 1 4.16558- 2                           306 4  2 1070
 0.0     + 0 5.29000+ 6           0           0           4           0 306 4  2 1071
 4.58982- 1 3.00793- 1 1.06552- 1 3.49893- 2                           306 4  2 1072
 0.0     + 0 5.54000+ 6           0           0           4           0 306 4  2 1073
 4.74586- 1 3.10572- 1 1.14140- 1 3.74992- 2                           306 4  2 1074
 0.0     + 0 5.74000+ 6           0           0           4           0 306 4  2 1075
 4.93578- 1 3.19973- 1 1.22738- 1 3.85314- 2                           306 4  2 1076
 0.0     + 0 6.05000+ 6           0           0           4           0 306 4  2 1077
 5.07006- 1 3.27381- 1 1.28056- 1 4.08669- 2                           306 4  2 1078
 0.0     + 0 6.37000+ 6           0           0           4           0 306 4  2 1079
 5.37844- 1 3.36950- 1 1.41082- 1 4.23046- 2                           306 4  2 1080
 0.0     + 0 6.66000+ 6           0           0           4           0 306 4  2 1081
 5.41648- 1 3.40935- 1 1.45634- 1 4.70608- 2                           306 4  2 1082
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 5.70372- 1 3.64251- 1 1.57827- 1 5.03786- 2                           306 4  2 1084
 0.0     + 0 7.32000+ 6           0           0           4           0 306 4  2 1085
 5.91753- 1 3.89383- 1 1.65693- 1 6.61126- 2                           306 4  2 1086
 0.0     + 0 7.47000+ 6           0           0           8           0 306 4  2 1087
 5.81992- 1 3.77011- 1 1.81938- 1 6.56450- 2 1.20167- 2 5.92396- 3 306 4  2 1088
 3.14176- 3 0.0     + 0                                                 306 4  2 1089
 0.0     + 0 8.96000+ 6           0           0           6           0 306 4  2 1090
 6.29843- 1 4.05524- 1 2.04011- 1 7.01956- 2 1.23444- 2 4.51447- 3 306 4  2 1091
 0.0     + 0 9.96000+ 6           0           0           8           0 306 4  2 1092
 6.60562- 1 4.28816- 1 2.27281- 1 8.72338- 2 2.15340- 2 9.58016- 3 306 4  2 1093
 4.47700- 3 0.0     + 0                                                 306 4  2 1094
 0.0     + 0 1.09500+ 7           0           0           6           0 306 4  2 1095
 6.85185- 1 4.51111- 1 2.44444- 1 9.62963- 2 2.35690- 2 7.78727- 3 306 4  2 1096
 0.0     + 0 1.20400+ 7           0           0           8           0 306 4  2 1097
 7.10260- 1 4.77939- 1 2.74958- 1 1.20652- 1 4.08310- 2 1.68682- 2 306 4  2 1098
 5.10788- 3 1.39871- 3                                                 306 4  2 1099
 0.0     + 0 1.29400+ 7           0           0           8           0 306 4  2 1100
 7.22914- 1 4.82711- 1 2.76823- 1 1.16336- 1 3.47039- 2 1.12778- 2 306 4  2 1101
 2.67404- 3 0.0     + 0                                                 306 4  2 1102
 0.0     + 0 1.39400+ 7           0           0           8           0 306 4  2 1103
 7.34593- 1 4.92848- 1 2.79738- 1 1.14410- 1 3.26340- 2 9.23907- 3 306 4  2 1104
 1.34953- 3 0.0     + 0                                                 306 4  2 1105
 0.0     + 0 1.40000+ 7           0           0           8           0 306 4  2 1106
 7.42131- 1 5.03886- 1 2.90008- 1 1.30452- 1 4.23557- 2 1.17993- 2 306 4  2 1107
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 0.0    + 0 1.60000+ 7          0          0          10          0 306 4  2 1112
 7.68266- 1 5.30717- 1 3.19999- 1 1.54405- 1 5.65962- 2 1.76305- 2 306 4  2 1113
 4.75894- 3 1.14553- 3 2.45822- 4 0.0    + 0                       306 4  2 1114
 0.0    + 0 1.70000+ 7          0          0          10          0 306 4  2 1115
 7.79530- 1 5.43697- 1 3.33931- 1 1.66394- 1 6.42442- 2 2.10212- 2 306 4  2 1116
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 0.0    + 0 1.80000+ 7          0          0          10          0 306 4  2 1118
 7.89919- 1 5.56365- 1 3.47408- 1 1.78358- 1 7.21630- 2 2.46933- 2 306 4  2 1119
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 0.0    + 0 1.90000+ 7          0          0          10          0 306 4  2 1121
 7.99466- 1 5.68711- 1 3.60461- 1 1.90241- 1 8.02989- 2 2.86353- 2 306 4  2 1122
 8.86877- 3 2.46646- 3 6.23342- 4 0.0    + 0                       306 4  2 1123
 0.0    + 0 2.00000+ 7          0          0          10          0 306 4  2 1124
 8.08261- 1 5.80718- 1 3.73157- 1 2.02020- 1 8.85989- 2 3.28273- 2 306 4  2 1125
 1.05741- 2 3.06107- 3 8.06211- 4 0.0    + 0                       306 4  2 1126
                                                                    306 4  0 1127
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 0.0    + 0 5.96345+ 0          0          1           0          0 306 4 16 1129
 0.0    + 0 0.0    + 0          0          0           1         15 306 4 16 1130
         15          2          0          0           0          0 306 4 16 1131
 0.0    + 0 6.61394+ 6          0          0           1          3 306 4 16 1132
          3          2          0          0           0          0 306 4 16 1133
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 5.00000- 1 6.61790- 1 6.00000- 1 9.33290- 1 7.00000- 1 1.28090+ 0 306 4 16 1142
 8.00000- 1 1.72470+ 0 9.00000- 1 2.32360+ 0 1.00000+ 0 3.03550+ 0 306 4 16 1143
 0.0    + 0 8.00000+ 6          0          0           1         21 306 4 16 1144
         21          2          0          0           0          0 306 4 16 1145
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 8.00000- 1 1.16380+ 0 9.00000- 1 1.36280+ 0 1.00000+ 0 1.56420+ 0 306 4 16 1152
 0.0    + 0 9.00000+ 6          0          0           1         21 306 4 16 1153
         21          2          0          0           0          0 306 4 16 1154
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 2.00000- 1 5.04020- 1 3.00000- 1 5.70150- 1 4.00000- 1 6.43040- 1 306 4 16 1159
 5.00000- 1 7.24250- 1 6.00000- 1 8.15280- 1 7.00000- 1 9.17220- 1 306 4 16 1160
 8.00000- 1 1.03060+ 0 9.00000- 1 1.15560+ 0 1.00000+ 0 1.29240+ 0 306 4 16 1161
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 2.00000- 1 5.18650- 1 3.00000- 1 5.75820- 1 4.00000- 1 6.35150- 1 306 4 16 1168
 5.00000- 1 7.00950- 1 6.00000- 1 7.79940- 1 7.00000- 1 8.66160- 1 306 4 16 1169
 8.00000- 1 9.60460- 1 9.00000- 1 1.06360+ 0 1.00000+ 0 1.17600+ 0 306 4 16 1170
 0.0     + 0 1.10000+ 7          0          0          1         21 306 4 16 1171
         21          2          0          0          0          0 306 4 16 1172
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 2.00000- 1 5.16890- 1 3.00000- 1 5.73590- 1 4.00000- 1 6.33470- 1 306 4 16 1177
 5.00000- 1 6.97120- 1 6.00000- 1 7.65050- 1 7.00000- 1 8.36950- 1 306 4 16 1178
 8.00000- 1 9.17410- 1 9.00000- 1 1.00910+ 0 1.00000+ 0 1.10840+ 0 306 4 16 1179
 0.0     + 0 1.20000+ 7          0          0          1         21 306 4 16 1180
         21          2          0          0          0          0 306 4 16 1181
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 8.00000- 1 8.95330- 1 9.00000- 1 9.74260- 1 1.00000+ 0 1.06270+ 0 306 4 16 1188
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 8.00000- 1 8.76820- 1 9.00000- 1 9.51580- 1 1.00000+ 0 1.03030+ 0 306 4 16 1197
 0.0     + 0 1.40000+ 7          0          0          1         21 306 4 16 1198
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         21          2          0          0          0          0 306 4 16 1208
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 5.00000- 1 6.63860- 1 6.00000- 1 7.18120- 1 7.00000- 1 7.78910- 1 306 4 16 1223
 8.00000- 1 8.42450- 1 9.00000- 1 9.08710- 1 1.00000+ 0 9.74360- 1 306 4 16 1224
 0.0     + 0 1.70000+ 7           0           0           1          21 306 4 16 1225
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          21           2           0           0           0           0 306 4 16 1244
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                                                                     306 4  0 1261
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          11           2           0           0           0           0 306 4 51 1265
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 0.0     + 0 0.0     + 0                                                 306 4 51 1267
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           2           2          0           0           0         0 306 4 52 1292
 0.0     + 0 4.15931+ 6           0           0           1         2 306 4 52 1293
           2           2          0           0           0         0 306 4 52 1294
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                                                                    306 4  0 1299
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           3           2          0           0           0         0 306 4 91 1305
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 5.00000- 1 7.55630- 1 6.00000- 1 8.91620- 1 7.00000- 1 1.06470+ 0 306 4 91 1314
 8.00000- 1 1.25680+ 0 9.00000- 1 1.48990+ 0 1.00000+ 0 1.74030+ 0 306 4 91 1315
 0.0     + 0 3.00000+ 6           0           0           1        21 306 4 91 1316
          21           2          0           0           0         0 306 4 91 1317
-1.00000+ 0 1.73130- 1-9.00000- 1 1.96560- 1-8.00000- 1 2.10810- 1 306 4 91 1318
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 8.00000- 1 9.04850- 1 9.00000- 1 9.86710- 1 1.00000+ 0 1.08120+ 0 306 4 91 1324
 0.0     + 0 4.00000+ 6           0           0           1          21 306 4 91 1325
          21           2           0           0           0           0 306 4 91 1326
-1.00000+ 0 2.10100- 1-9.00000- 1 2.27190- 1-8.00000- 1 2.40660- 1 306 4 91 1327
-7.00000- 1 2.64710- 1-6.00000- 1 2.82900- 1-5.00000- 1 3.07380- 1 306 4 91 1328
-4.00000- 1 3.30920- 1-3.00000- 1 3.57930- 1-2.00000- 1 3.86240- 1 306 4 91 1329
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 2.00000- 1 5.23180- 1 3.00000- 1 5.71390- 1 4.00000- 1 6.19810- 1 306 4 91 1331
 5.00000- 1 6.62680- 1 6.00000- 1 7.21710- 1 7.00000- 1 7.83440- 1 306 4 91 1332
 8.00000- 1 8.48170- 1 9.00000- 1 9.15990- 1 1.00000+ 0 9.83150- 1 306 4 91 1333
 0.0     + 0 5.00000+ 6           0           0           1          21 306 4 91 1334
          21           2           0           0           0           0 306 4 91 1335
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 2.00000- 1 5.31410- 1 3.00000- 1 5.65290- 1 4.00000- 1 6.13230- 1 306 4 91 1340
 5.00000- 1 6.60840- 1 6.00000- 1 7.04410- 1 7.00000- 1 7.62260- 1 306 4 91 1341
 8.00000- 1 8.22180- 1 9.00000- 1 8.84020- 1 1.00000+ 0 9.42890- 1 306 4 91 1342
 0.0     + 0 6.00000+ 6           0           0           1          21 306 4 91 1343
          21           2           0           0           0           0 306 4 91 1344
-1.00000+ 0 2.28880- 1-9.00000- 1 2.50810- 1-8.00000- 1 2.65750- 1 306 4 91 1345
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 2.00000- 1 5.31180- 1 3.00000- 1 5.68780- 1 4.00000- 1 6.08240- 1 306 4 91 1349
 5.00000- 1 6.55450- 1 6.00000- 1 6.99560- 1 7.00000- 1 7.50100- 1 306 4 91 1350
 8.00000- 1 8.07450- 1 9.00000- 1 8.66130- 1 1.00000+ 0 9.20730- 1 306 4 91 1351
 0.0     + 0 7.00000+ 6           0           0           1          21 306 4 91 1352
          21           2           0           0           0           0 306 4 91 1353
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 2.00000- 1 5.30060- 1 3.00000- 1 5.69070- 1 4.00000- 1 6.04430- 1 306 4 91 1358
 5.00000- 1 6.51170- 1 6.00000- 1 6.96150- 1 7.00000- 1 7.41900- 1 306 4 91 1359
 8.00000- 1 7.97620- 1 9.00000- 1 8.54320- 1 1.00000+ 0 9.06280- 1 306 4 91 1360
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 8.00000- 1 7.90680- 1 9.00000- 1 8.46020- 1 1.00000+ 0 8.96190- 1 306 4 91 1369
 0.0     + 0 9.00000+ 6           0           0           1          21 306 4 91 1370
          21           2           0           0           0           0 306 4 91 1371
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 8.00000- 1 7.86120- 1 9.00000- 1 8.40510- 1 1.00000+ 0 8.89420- 1 306 4 91 1378
 0.0     + 0 1.00000+ 7           0           0           1          21 306 4 91 1379
         21          2           0           0           0           0 306 4 91 1380
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 2.00000- 1 5.27990- 1 3.00000- 1 5.67830- 1 4.00000- 1 5.98780- 1 306 4 91 1385
 5.00000- 1 6.44440- 1 6.00000- 1 6.89200- 1 7.00000- 1 7.29500- 1 306 4 91 1386
 8.00000- 1 7.82770- 1 9.00000- 1 8.36460- 1 1.00000+ 0 8.84430- 1 306 4 91 1387
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         21          2           0           0           0           0 306 4 91 1389
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 8.00000- 1 7.79690- 1 9.00000- 1 8.32790- 1 1.00000+ 0 8.80000- 1 306 4 91 1396
 0.0     + 0 1.20000+ 7           0           0           1          21 306 4 91 1397
         21          2           0           0           0           0 306 4 91 1398
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 8.00000- 1 7.77530- 1 9.00000- 1 8.30180- 1 1.00000+ 0 8.76800- 1 306 4 91 1405
 0.0     + 0 1.30000+ 7           0           0           1          21 306 4 91 1406
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         21          2           0           0           0           0 306 4 91 1416
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 5.00000- 1 6.39960- 1 6.00000- 1 6.84250- 1 7.00000- 1 7.21870- 1 306 4 91 1422
 8.00000- 1 7.73710- 1 9.00000- 1 8.25650- 1 1.00000+ 0 8.71350- 1 306 4 91 1423
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 5.00000- 1 6.39280- 1 6.00000- 1 6.83500- 1 7.00000- 1 7.20720- 1 306 4 91 1431
 8.00000- 1 7.72340- 1 9.00000- 1 8.24010- 1 1.00000+ 0 8.69350- 1 306 4 91 1432
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         21           2           0           0           0           0 306 4 91 1434
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         21           2           0           0           0           0 306 4 91 1443
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         21           2           0           0           0           0 306 4 91 1452
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         15          2          0          0          0          0 306 5 16 1485
 0.0    + 0 6.61394+ 6          0          0          1          3 306 5 16 1486
          3          2          0          0          0          0 306 5 16 1487
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 0.0    + 0 7.00000+ 6          0          0          1         21 306 5 16 1489
         21          2          0          0          0          0 306 5 16 1490
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1.24850+ 5 2.12640- 6 1.66470+ 5 2.12830- 6 2.08080+ 5 2.05750- 6 306 5 16 1492
2.49700+ 5 1.97690- 6 2.91320+ 5 1.86660- 6 3.32940+ 5 1.71520- 6 306 5 16 1493
3.74550+ 5 1.51940- 6 4.16170+ 5 1.41300- 6 4.57790+ 5 1.20380- 6 306 5 16 1494
4.99400+ 5 1.07810- 6 5.41020+ 5 8.60770- 7 5.82640+ 5 7.45970- 7 306 5 16 1495
6.24250+ 5 5.13310- 7 6.65870+ 5 4.32210- 7 7.07490+ 5 2.92980- 7 306 5 16 1496
7.49100+ 5 1.51710- 7 7.90720+ 5 1.10920- 7 8.32340+ 5 0.0    + 0 306 5 16 1497
 0.0    + 0 8.00000+ 6          0          0          1         21 306 5 16 1498
         21          2          0          0          0          0 306 5 16 1499
 0.0    + 0 0.0    + 0 1.00100+ 5 6.80380- 7 2.00200+ 5 8.87970- 7 306 5 16 1500
3.00300+ 5 9.82480- 7 4.00410+ 5 9.70070- 7 5.00510+ 5 9.13820- 7 306 5 16 1501
6.00610+ 5 8.43820- 7 7.00710+ 5 7.78500- 7 8.00810+ 5 7.02030- 7 306 5 16 1502
9.00910+ 5 6.31390- 7 1.00100+ 6 5.56520- 7 1.10110+ 6 4.80890- 7 306 5 16 1503
1.20120+ 6 4.08750- 7 1.30130+ 6 3.41120- 7 1.40140+ 6 2.76000- 7 306 5 16 1504
1.50150+ 6 2.12440- 7 1.60160+ 6 1.50240- 7 1.70170+ 6 8.96340- 8 306 5 16 1505
1.80180+ 6 6.10490- 8 1.90190+ 6 2.27700- 8 2.00200+ 6 0.0    + 0 306 5 16 1506
 0.0    + 0 9.00000+ 6          0          0          1         21 306 5 16 1507
         21          2          0          0          0          0 306 5 16 1508
 0.0    + 0 0.0    + 0 1.53890+ 5 3.90330- 7 3.07770+ 5 5.19090- 7 306 5 16 1509
4.61660+ 5 5.91860- 7 6.15550+ 5 6.26780- 7 7.69430+ 5 6.24970- 7 306 5 16 1510
9.23320+ 5 5.78590- 7 1.07720+ 6 5.29190- 7 1.23110+ 6 4.77210- 7 306 5 16 1511
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2.30830+ 6 1.40840- 7 2.46220+ 6 1.02330- 7 2.61610+ 6 6.75830- 8 306 5 16 1514
2.77000+ 6 3.71220- 8 2.92390+ 6 1.21210- 8 3.07770+ 6 0.0    + 0 306 5 16 1515
 0.0    + 0 1.00000+ 7          0          0          1         21 306 5 16 1516
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1.23720+ 6 4.49250- 7 1.44340+ 6 4.09980- 7 1.64960+ 6 3.69710- 7 306 5 16 1520
1.85590+ 6 3.28790- 7 2.06210+ 6 2.87540- 7 2.26830+ 6 2.48260- 7 306 5 16 1521
2.47450+ 6 2.10070- 7 2.68070+ 6 1.74560- 7 2.88690+ 6 1.38510- 7 306 5 16 1522
3.09310+ 6 1.04300- 7 3.29930+ 6 7.54050- 8 3.50550+ 6 4.91780- 8 306 5 16 1523
3.71170+ 6 2.63860- 8 3.91790+ 6 8.19380- 9 4.12410+ 6 0.0    + 0 306 5 16 1524
 0.0    + 0 1.10000+ 7          0          0          1         21 306 5 16 1525
         21          2          0          0          0          0 306 5 16 1526
 0.0    + 0 0.0    + 0 2.57810+ 5 2.08750- 7 5.15620+ 5 2.80420- 7 306 5 16 1527
7.73430+ 5 3.24130- 7 1.03120+ 6 3.50240- 7 1.28910+ 6 3.62080- 7 306 5 16 1528
1.54690+ 6 3.59900- 7 1.80470+ 6 3.38250- 7 2.06250+ 6 3.02990- 7 306 5 16 1529
2.32030+ 6 2.69580- 7 2.57810+ 6 2.35880- 7 2.83590+ 6 2.01910- 7 306 5 16 1530
3.09370+ 6 1.72800- 7 3.35150+ 6 1.40380- 7 3.60940+ 6 1.13780- 7 306 5 16 1531
3.86720+ 6 8.79050- 8 4.12500+ 6 6.32550- 8 4.38280+ 6 4.00190- 8 306 5 16 1532
4.64060+ 6 2.03880- 8 4.89840+ 6 6.16070- 9 5.15620+ 6 0.0    + 0 306 5 16 1533
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.........10.........20.........30.........40.........50.........60......MAT MF MT  SEQ
 0.0     + 0 1.20000+ 7           0           0           1          21 306 5 16 1534
         21           2           0           0           0           0 306 5 16 1535
 0.0     + 0 0.0     + 0 3.09000+ 5 1.68720- 7 6.18010+ 5 2.27120- 7 306 5 16 1536
 9.27010+ 5 2.63250- 7 1.23600+ 6 2.85520- 7 1.54500+ 6 2.96790- 7 306 5 16 1537
 1.85400+ 6 2.97710- 7 2.16300+ 6 2.86400- 7 2.47200+ 6 2.57860- 7 306 5 16 1538
 2.78100+ 6 2.29610- 7 3.09000+ 6 2.01150- 7 3.39910+ 6 1.72960- 7 306 5 16 1539
 3.70810+ 6 1.44810- 7 4.01710+ 6 1.21110- 7 4.32610+ 6 9.51970- 8 306 5 16 1540
 4.63510+ 6 7.37520- 8 4.94410+ 6 5.38330- 8 5.25310+ 6 3.54560- 8 306 5 16 1541
 5.56210+ 6 1.92060- 8 5.87110+ 6 5.74570- 9 6.18010+ 6 0.0     + 0 306 5 16 1542
 0.0     + 0 1.30000+ 7           0           0           1          21 306 5 16 1543
         21           2           0           0           0           0 306 5 16 1544
 0.0     + 0 0.0     + 0 3.59930+ 5 1.41450- 7 7.19870+ 5 1.90690- 7 306 5 16 1545
 1.07980+ 6 2.21440- 7 1.43970+ 6 2.40770- 7 1.79970+ 6 2.51140- 7 306 5 16 1546
 2.15960+ 6 2.53300- 7 2.51950+ 6 2.46490- 7 2.87950+ 6 2.25480- 7 306 5 16 1547
 3.23940+ 6 2.00600- 7 3.59930+ 6 1.75510- 7 3.95930+ 6 1.51290- 7 306 5 16 1548
 4.31920+ 6 1.27790- 7 4.67910+ 6 1.04430- 7 5.03910+ 6 8.44580- 8 306 5 16 1549
 5.39900+ 6 6.31820- 8 5.75890+ 6 4.63770- 8 6.11890+ 6 3.08560- 8 306 5 16 1550
 6.47880+ 6 1.71370- 8 6.83870+ 6 5.93130- 9 7.19870+ 6 0.0     + 0 306 5 16 1551
 0.0     + 0 1.40000+ 7           0           0           1          21 306 5 16 1552
         21           2           0           0           0           0 306 5 16 1553
 0.0     + 0 0.0     + 0 4.10680+ 5 1.21860- 7 8.21370+ 5 1.64450- 7 306 5 16 1554
 1.23200+ 6 1.91230- 7 1.64270+ 6 2.08280- 7 2.05340+ 6 2.17790- 7 306 5 16 1555
 2.46410+ 6 2.20460- 7 2.87480+ 6 2.15970- 7 3.28550+ 6 2.01030- 7 306 5 16 1556
 3.69610+ 6 1.77380- 7 4.10680+ 6 1.55630- 7 4.51750+ 6 1.33990- 7 306 5 16 1557
 4.92820+ 6 1.12670- 7 5.33890+ 6 9.36130- 8 5.74960+ 6 7.46180- 8 306 5 16 1558
 6.16020+ 6 5.73080- 8 6.57090+ 6 4.06640- 8 6.98160+ 6 2.72000- 8 306 5 16 1559
 7.39230+ 6 1.52810- 8 7.80300+ 6 5.52830- 9 8.21370+ 6 0.0     + 0 306 5 16 1560
 0.0     + 0 1.50000+ 7           0           0           1          21 306 5 16 1561
         21           2           0           0           0           0 306 5 16 1562
 0.0     + 0 0.0     + 0 4.61300+ 5 1.06930- 7 9.22610+ 5 1.44420- 7 306 5 16 1563
 1.38390+ 6 1.68110- 7 1.84520+ 6 1.83340- 7 2.30650+ 6 1.92050- 7 306 5 16 1564
 2.76780+ 6 1.94930- 7 3.22910+ 6 1.91820- 7 3.69040+ 6 1.80550- 7 306 5 16 1565
 4.15170+ 6 1.60580- 7 4.61300+ 6 1.40450- 7 5.07430+ 6 1.20710- 7 306 5 16 1566
 5.53560+ 6 1.02160- 7 5.99690+ 6 8.42550- 8 6.45820+ 6 6.65820- 8 306 5 16 1567
 6.91950+ 6 5.17030- 8 7.38080+ 6 3.61330- 8 7.84210+ 6 2.42510- 8 306 5 16 1568
 8.30340+ 6 1.37180- 8 8.76480+ 6 5.08370- 9 9.22610+ 6 0.0     + 0 306 5 16 1569
 0.0     + 0 1.60000+ 7           0           0           1          21 306 5 16 1570
         21           2           0           0           0           0 306 5 16 1571
 0.0     + 0 0.0     + 0 5.11830+ 5 9.53040- 8 1.02370+ 6 1.28810- 7 306 5 16 1572
 1.53550+ 6 1.50050- 7 2.04730+ 6 1.63820- 7 2.55910+ 6 1.71840- 7 306 5 16 1573
 3.07100+ 6 1.74760- 7 3.58280+ 6 1.72530- 7 4.09460+ 6 1.63890- 7 306 5 16 1574
 4.60640+ 6 1.45630- 7 5.11830+ 6 1.27840- 7 5.63010+ 6 1.10150- 7 306 5 16 1575
 6.14190+ 6 9.29820- 8 6.65370+ 6 7.63500- 8 7.16560+ 6 6.06400- 8 306 5 16 1576
 7.67740+ 6 4.69180- 8 8.18920+ 6 3.32980- 8 8.70100+ 6 2.18710- 8 306 5 16 1577
 9.21290+ 6 1.24300- 8 9.72470+ 6 4.67820- 9 1.02370+ 7 0.0     + 0 306 5 16 1578
 0.0     + 0 1.70000+ 7           0           0           1          21 306 5 16 1579
         21           2           0           0           0           0 306 5 16 1580
 0.0     + 0 0.0     + 0 5.62280+ 5 8.59470- 8 1.12460+ 6 1.16220- 7 306 5 16 1581
 1.68680+ 6 1.35480- 7 2.24910+ 6 1.48030- 7 2.81140+ 6 1.55450- 7 306 5 16 1582
 3.37370+ 6 1.58340- 7 3.93590+ 6 1.56710- 7 4.49820+ 6 1.49680- 7 306 5 16 1583
 5.06050+ 6 1.34410- 7 5.62280+ 6 1.16940- 7 6.18500+ 6 1.00840- 7 306 5 16 1584
 6.74730+ 6 8.50610- 8 7.30960+ 6 6.96980- 8 7.87190+ 6 5.62360- 8 306 5 16 1585
 8.43410+ 6 4.28700- 8 8.99640+ 6 3.09930- 8 9.55870+ 6 1.99050- 8 306 5 16 1586
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 1.01210+ 7 1.13510- 8 1.06830+ 7 4.31900- 9 1.12460+ 7 0.0     + 0 306 5 16 1587
 0.0     + 0 1.80000+ 7          0          0          1          21 306 5 16 1588
         21          2          0          0          0           0 306 5 16 1589
 0.0     + 0 0.0     + 0 6.12670+ 5 7.82680- 8 1.22530+ 6 1.05880- 7 306 5 16 1590
 1.83800+ 6 1.23490- 7 2.45070+ 6 1.35030- 7 3.06330+ 6 1.41920- 7 306 5 16 1591
 3.67600+ 6 1.44740- 7 4.28870+ 6 1.43540- 7 4.90130+ 6 1.37650- 7 306 5 16 1592
 5.51400+ 6 1.24150- 7 6.12670+ 6 1.08650- 7 6.73930+ 6 9.28730- 8 306 5 16 1593
 7.35200+ 6 7.83050- 8 7.96470+ 6 6.47830- 8 8.57730+ 6 5.20350- 8 306 5 16 1594
 9.19000+ 6 3.94370- 8 9.80270+ 6 2.87530- 8 1.04150+ 7 1.82590- 8 306 5 16 1595
 1.10280+ 7 1.04390- 8 1.16410+ 7 4.00460- 9 1.22530+ 7 0.0     + 0 306 5 16 1596
 0.0     + 0 1.90000+ 7          0          0          1          21 306 5 16 1597
         21          2          0          0          0           0 306 5 16 1598
 0.0     + 0 0.0     + 0 6.63010+ 5 7.18020- 8 1.32600+ 6 9.71720- 8 306 5 16 1599
 1.98900+ 6 1.13380- 7 2.65210+ 6 1.24040- 7 3.31510+ 6 1.30470- 7 306 5 16 1600
 3.97810+ 6 1.33210- 7 4.64110+ 6 1.32310- 7 5.30410+ 6 1.27270- 7 306 5 16 1601
 5.96710+ 6 1.15110- 7 6.63010+ 6 1.01070- 7 7.29310+ 6 8.69190- 8 306 5 16 1602
 7.95620+ 6 7.32710- 8 8.61920+ 6 6.05000- 8 9.28220+ 6 4.83000- 8 306 5 16 1603
 9.94520+ 6 3.64740- 8 1.06080+ 7 2.67360- 8 1.12710+ 7 1.68510- 8 306 5 16 1604
 1.19340+ 7 9.65390- 9 1.25970+ 7 3.72690- 9 1.32600+ 7 0.0     + 0 306 5 16 1605
 0.0     + 0 2.00000+ 7          0          0          1          21 306 5 16 1606
         21          2          0          0          0           0 306 5 16 1607
 0.0     + 0 0.0     + 0 7.13320+ 5 6.63360- 8 1.42660+ 6 8.98020- 8 306 5 16 1608
 2.14000+ 6 1.04820- 7 2.85330+ 6 1.14730- 7 3.56660+ 6 1.20760- 7 306 5 16 1609
 4.27990+ 6 1.23400- 7 4.99330+ 6 1.22730- 7 5.70660+ 6 1.18340- 7 306 5 16 1610
 6.41990+ 6 1.08100- 7 7.13320+ 6 9.43330- 8 7.84650+ 6 8.13130- 8 306 5 16 1611
 8.55990+ 6 6.86360- 8 9.27320+ 6 5.65640- 8 9.98650+ 6 4.50380- 8 306 5 16 1612
 1.07000+ 7 3.39230- 8 1.14130+ 7 2.49620- 8 1.21260+ 7 1.56460- 8 306 5 16 1613
 1.28400+ 7 8.97830- 9 1.35530+ 7 3.48370- 9 1.42660+ 7 0.0     + 0 306 5 16 1614
                                                                     306 5  0 1615
 3.00600+ 3 5.96345+ 0          0          0          1           0 306 5 91 1616
 0.0     + 0 0.0     + 0          0          1          1           2 306 5 91 1617
          2          2          0          0          0           0 306 5 91 1618
 1.72057+ 6 1.00000+ 0 2.00000+ 7 1.00000+ 0                         306 5 91 1619
 0.0     + 0 0.0     + 0          0          0          1          20 306 5 91 1620
         20          2          0          0          0           0 306 5 91 1621
 0.0     + 0 1.72057+ 6          0          0          1           3 306 5 91 1622
          3          2          0          0          0           0 306 5 91 1623
 0.0     + 0 0.0     + 0 1.77420+ 4 5.63650- 5 3.54830+ 4 0.0     + 0 306 5 91 1624
 0.0     + 0 2.00000+ 6          0          0          1          21 306 5 91 1625
         21          2          0          0          0           0 306 5 91 1626
 0.0     + 0 0.0     + 0 2.15070+ 4 3.36540- 6 4.30140+ 4 4.31810- 6 306 5 91 1627
 6.45210+ 4 4.58440- 6 8.60280+ 4 4.40140- 6 1.07540+ 5 4.15950- 6 306 5 91 1628
 1.29040+ 5 3.87580- 6 1.50550+ 5 3.53900- 6 1.72060+ 5 3.23750- 6 306 5 91 1629
 1.93560+ 5 2.90990- 6 2.15070+ 5 2.57380- 6 2.36580+ 5 2.23940- 6 306 5 91 1630
 2.58090+ 5 1.90780- 6 2.79590+ 5 1.57530- 6 3.01100+ 5 1.23900- 6 306 5 91 1631
 3.22610+ 5 9.86030- 7 3.44110+ 5 7.30070- 7 3.65620+ 5 4.50230- 7 306 5 91 1632
 3.87130+ 5 2.84630- 7 4.08640+ 5 1.18920- 7 4.30140+ 5 0.0     + 0 306 5 91 1633
 0.0     + 0 3.00000+ 6          0          0          1          21 306 5 91 1634
         21          2          0          0          0           0 306 5 91 1635
 0.0     + 0 0.0     + 0 7.41210+ 4 7.11960- 7 1.48240+ 5 9.57580- 7 306 5 91 1636
 2.22360+ 5 1.10860- 6 2.96480+ 5 1.20060- 6 3.70600+ 5 1.24520- 6 306 5 91 1637
 4.44720+ 5 1.24460- 6 5.18840+ 5 1.18310- 6 5.92970+ 5 1.06830- 6 306 5 91 1638
 6.67090+ 5 9.48340- 7 7.41210+ 5 8.30900- 7 8.15330+ 5 7.17100- 7 306 5 91 1639
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 1.11180+ 6 3.07310- 7 1.18590+ 6 2.23540- 7 1.26010+ 6 1.46230- 7 306 5 91 1641
 1.33420+ 6 7.76480- 8 1.40830+ 6 2.09820- 8 1.48240+ 6 0.0     + 0 306 5 91 1642
 0.0     + 0 4.00000+ 6           0           0           1          21 306 5 91 1643
          21           2           0           0           0           0 306 5 91 1644
 0.0     + 0 0.0     + 0 1.24870+ 5 3.93060- 7 2.49750+ 5 5.31040- 7 306 5 91 1645
 3.74620+ 5 6.18330- 7 4.99500+ 5 6.74670- 7 6.24370+ 5 7.07120- 7 306 5 91 1646
 7.49250+ 5 7.18310- 7 8.74120+ 5 7.07810- 7 9.99000+ 5 6.69080- 7 306 5 91 1647
 1.12390+ 6 5.94770- 7 1.24870+ 6 5.21290- 7 1.37360+ 6 4.48790- 7 306 5 91 1648
 1.49850+ 6 3.79310- 7 1.62340+ 6 3.12220- 7 1.74820+ 6 2.46320- 7 306 5 91 1649
 1.87310+ 6 1.91900- 7 1.99800+ 6 1.33640- 7 2.12290+ 6 8.99060- 8 306 5 91 1650
 2.24770+ 6 5.11250- 8 2.37260+ 6 1.93620- 8 2.49750+ 6 0.0     + 0 306 5 91 1651
 0.0     + 0 5.00000+ 6           0           0           1          21 306 5 91 1652
          21           2           0           0           0           0 306 5 91 1653
 0.0     + 0 0.0     + 0 1.75250+ 5 2.71140- 7 3.50500+ 5 3.66980- 7 306 5 91 1654
 5.25760+ 5 4.28230- 7 7.01010+ 5 4.68560- 7 8.76260+ 5 4.92940- 7 306 5 91 1655
 1.05150+ 6 5.03380- 7 1.22680+ 6 5.00170- 7 1.40200+ 6 4.81430- 7 306 5 91 1656
 1.57730+ 6 4.35700- 7 1.75250+ 6 3.82770- 7 1.92780+ 6 3.29500- 7 306 5 91 1657
 2.10300+ 6 2.77970- 7 2.27830+ 6 2.29430- 7 2.45350+ 6 1.83080- 7 306 5 91 1658
 2.62880+ 6 1.38210- 7 2.80400+ 6 1.01540- 7 2.97930+ 6 6.39240- 8 306 5 91 1659
 3.15450+ 6 3.67380- 8 3.32980+ 6 1.43640- 8 3.50500+ 6 0.0     + 0 306 5 91 1660
 0.0     + 0 6.00000+ 6           0           0           1          21 306 5 91 1661
          21           2           0           0           0           0 306 5 91 1662
 0.0     + 0 0.0     + 0 2.25480+ 5 2.06860- 7 4.50970+ 5 2.80240- 7 306 5 91 1663
 6.76450+ 5 3.27400- 7 9.01930+ 5 3.58760- 7 1.12740+ 6 3.78150- 7 306 5 91 1664
 1.35290+ 6 3.87190- 7 1.57840+ 6 3.86260- 7 1.80390+ 6 3.74420- 7 306 5 91 1665
 2.02930+ 6 3.46100- 7 2.25480+ 6 3.03380- 7 2.48030+ 6 2.59810- 7 306 5 91 1666
 2.70580+ 6 2.19640- 7 2.93130+ 6 1.80770- 7 3.15680+ 6 1.43430- 7 306 5 91 1667
 3.38220+ 6 1.11020- 7 3.60770+ 6 7.97910- 8 3.83320+ 6 5.18170- 8 306 5 91 1668
 4.05870+ 6 2.85810- 8 4.28420+ 6 1.13240- 8 4.50970+ 6 0.0     + 0 306 5 91 1669
 0.0     + 0 7.00000+ 6           0           0           1          21 306 5 91 1670
          21           2           0           0           0           0 306 5 91 1671
 0.0     + 0 0.0     + 0 2.75640+ 5 1.67110- 7 5.51280+ 5 2.26530- 7 306 5 91 1672
 8.26920+ 5 2.64840- 7 1.10260+ 6 2.90480- 7 1.37820+ 6 3.06540- 7 306 5 91 1673
 1.65380+ 6 3.14370- 7 1.92950+ 6 3.14350- 7 2.20510+ 6 3.05910- 7 306 5 91 1674
 2.48080+ 6 2.86210- 7 2.75640+ 6 2.50870- 7 3.03210+ 6 2.16280- 7 306 5 91 1675
 3.30770+ 6 1.81790- 7 3.58330+ 6 1.49010- 7 3.85900+ 6 1.19870- 7 306 5 91 1676
 4.13460+ 6 9.20400- 8 4.41030+ 6 6.55180- 8 4.68590+ 6 4.35000- 8 306 5 91 1677
 4.96150+ 6 2.33570- 8 5.23720+ 6 9.32240- 9 5.51280+ 6 0.0     + 0 306 5 91 1678
 0.0     + 0 8.00000+ 6           0           0           1          21 306 5 91 1679
          21           2           0           0           0           0 306 5 91 1680
 0.0     + 0 0.0     + 0 3.25760+ 5 1.40150- 7 6.51520+ 5 1.90050- 7 306 5 91 1681
 9.77270+ 5 2.22310- 7 1.30300+ 6 2.43980- 7 1.62880+ 6 2.57680- 7 306 5 91 1682
 1.95450+ 6 2.64550- 7 2.28030+ 6 2.64940- 7 2.60610+ 6 2.58470- 7 306 5 91 1683
 2.93180+ 6 2.43280- 7 3.25760+ 6 2.14400- 7 3.58330+ 6 1.84430- 7 306 5 91 1684
 3.90910+ 6 1.55850- 7 4.23480+ 6 1.28370- 7 4.56060+ 6 1.02570- 7 306 5 91 1685
 4.88640+ 6 7.83520- 8 5.21210+ 6 5.55250- 8 5.53790+ 6 3.72190- 8 306 5 91 1686
 5.86360+ 6 1.97390- 8 6.18940+ 6 7.91530- 9 6.51520+ 6 0.0     + 0 306 5 91 1687
 0.0     + 0 9.00000+ 6           0           0           1          21 306 5 91 1688
          21           2           0           0           0           0 306 5 91 1689
 0.0     + 0 0.0     + 0 3.75850+ 5 1.20760- 7 7.51700+ 5 1.63800- 7 306 5 91 1690
 1.12750+ 6 1.91680- 7 1.50340+ 6 2.10450- 7 1.87920+ 6 2.22400- 7 306 5 91 1691
 2.25510+ 6 2.28510- 7 2.63090+ 6 2.29090- 7 3.00680+ 6 2.23890- 7 306 5 91 1692
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........10........20........30........40........50........60......MAT MF MT  SEQ
 3.38260+ 6 2.11520- 7 3.75850+ 6 1.87590- 7 4.13430+ 6 1.60620- 7 306 5 91 1693
 4.51020+ 6 1.35950- 7 4.88600+ 6 1.12080- 7 5.26190+ 6 8.94630- 8 306 5 91 1694
 5.63770+ 6 6.81910- 8 6.01360+ 6 4.81940- 8 6.38940+ 6 3.24870- 8 306 5 91 1695
 6.76530+ 6 1.71000- 8 7.14110+ 6 6.87940- 9 7.51700+ 6 0.0     + 0 306 5 91 1696
 0.0     + 0 1.00000+ 7           0           0           1          21 306 5 91 1697
         21          2           0           0           0           0 306 5 91 1698
 0.0     + 0 0.0     + 0 4.25920+ 5 1.06100- 7 8.51840+ 5 1.43950- 7 306 5 91 1699
 1.27780+ 6 1.68490- 7 1.70370+ 6 1.85060- 7 2.12960+ 6 1.95650- 7 306 5 91 1700
 2.55550+ 6 2.01140- 7 2.98140+ 6 2.01830- 7 3.40740+ 6 1.97500- 7 306 5 91 1701
 3.83330+ 6 1.87070- 7 4.25920+ 6 1.66410- 7 4.68510+ 6 1.42560- 7 306 5 91 1702
 5.11100+ 6 1.20470- 7 5.53700+ 6 9.93700- 8 5.96290+ 6 7.92820- 8 306 5 91 1703
 6.38880+ 6 6.03510- 8 6.81470+ 6 4.26260- 8 7.24070+ 6 2.88080- 8 306 5 91 1704
 7.66660+ 6 1.50860- 8 8.09250+ 6 6.08350- 9 8.51840+ 6 0.0     + 0 306 5 91 1705
 0.0     + 0 1.10000+ 7           0           0           1          21 306 5 91 1706
         21          2           0           0           0           0 306 5 91 1707
 0.0     + 0 0.0     + 0 4.75980+ 5 9.45590- 8 9.51960+ 5 1.28320- 7 306 5 91 1708
 1.42790+ 6 1.50230- 7 1.90390+ 6 1.65050- 7 2.37990+ 6 1.74550- 7 306 5 91 1709
 2.85590+ 6 1.79530- 7 3.33190+ 6 1.80250- 7 3.80780+ 6 1.76570- 7 306 5 91 1710
 4.28380+ 6 1.67570- 7 4.75980+ 6 1.49360- 7 5.23580+ 6 1.28690- 7 306 5 91 1711
 5.71180+ 6 1.08060- 7 6.18780+ 6 8.91580- 8 6.66370+ 6 7.11140- 8 306 5 91 1712
 7.13970+ 6 5.40850- 8 7.61570+ 6 3.90410- 8 8.09170+ 6 2.58530- 8 306 5 91 1713
 8.56770+ 6 1.34880- 8 9.04360+ 6 5.44910- 9 9.51960+ 6 0.0     + 0 306 5 91 1714
 0.0     + 0 1.20000+ 7           0           0           1          21 306 5 91 1715
         21          2           0           0           0           0 306 5 91 1716
 0.0     + 0 0.0     + 0 5.26030+ 5 8.53200- 8 1.05210+ 6 1.15800- 7 306 5 91 1717
 1.57810+ 6 1.35600- 7 2.10410+ 6 1.49000- 7 2.63020+ 6 1.57630- 7 306 5 91 1718
 3.15620+ 6 1.62180- 7 3.68220+ 6 1.62920- 7 4.20830+ 6 1.59710- 7 306 5 91 1719
 4.73430+ 6 1.51800- 7 5.26030+ 6 1.35500- 7 5.78640+ 6 1.16990- 7 306 5 91 1720
 6.31240+ 6 9.79890- 8 6.83840+ 6 8.08660- 8 7.36450+ 6 6.44880- 8 306 5 91 1721
 7.89050+ 6 4.90140- 8 8.41650+ 6 3.56330- 8 8.94260+ 6 2.34530- 8 306 5 91 1722
 9.46860+ 6 1.22010- 8 9.99460+ 6 4.93620- 9 1.05210+ 7 0.0     + 0 306 5 91 1723
 0.0     + 0 1.30000+ 7           0           0           1          21 306 5 91 1724
         21          2           0           0           0           0 306 5 91 1725
 0.0     + 0 0.0     + 0 5.76080+ 5 7.77040- 8 1.15220+ 6 1.05480- 7 306 5 91 1726
 1.72820+ 6 1.23520- 7 2.30430+ 6 1.35760- 7 2.88040+ 6 1.43650- 7 306 5 91 1727
 3.45650+ 6 1.47850- 7 4.03250+ 6 1.48580- 7 4.60860+ 6 1.45730- 7 306 5 91 1728
 5.18470+ 6 1.38690- 7 5.76080+ 6 1.24330- 7 6.33690+ 6 1.07150- 7 306 5 91 1729
 6.91290+ 6 8.98850- 8 7.48900+ 6 7.39540- 8 8.06510+ 6 5.89680- 8 306 5 91 1730
 8.64120+ 6 4.47960- 8 9.21720+ 6 3.27130- 8 9.79330+ 6 2.14520- 8 306 5 91 1731
 1.03690+ 7 1.11350- 8 1.09450+ 7 4.51020- 9 1.15220+ 7 0.0     + 0 306 5 91 1732
 0.0     + 0 1.40000+ 7           0           0           1          21 306 5 91 1733
         21          2           0           0           0           0 306 5 91 1734
 0.0     + 0 0.0     + 0 6.26120+ 5 7.13250- 8 1.25220+ 6 9.68270- 8 306 5 91 1735
 1.87840+ 6 1.13410- 7 2.50450+ 6 1.24660- 7 3.13060+ 6 1.31930- 7 306 5 91 1736
 3.75670+ 6 1.35820- 7 4.38280+ 6 1.36540- 7 5.00890+ 6 1.34010- 7 306 5 91 1737
 5.63510+ 6 1.27650- 7 6.26120+ 6 1.14930- 7 6.88730+ 6 9.87960- 8 306 5 91 1738
 7.51340+ 6 8.32220- 8 8.13950+ 6 6.81160- 8 8.76570+ 6 5.43060- 8 306 5 91 1739
 9.39180+ 6 4.12380- 8 1.00180+ 7 3.02120- 8 1.06440+ 7 1.97620- 8 306 5 91 1740
 1.12700+ 7 1.02390- 8 1.18960+ 7 4.15110- 9 1.25220+ 7 0.0     + 0 306 5 91 1741
 0.0     - 0 1.50000+ 7           0           0           1          21 306 5 91 1742
         21          2           0           0           0           0 306 5 91 1743
 0.0     + 0 0.0     + 0 6.76150+ 5 6.59280- 8 1.35230+ 6 8.95080- 8 306 5 91 1744
 2.02850- 6 1.04850- 7 2.70460+ 6 1.15270- 7 3.38080+ 6 1.22010- 7 306 5 91 1745
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 4.05690+ 6 1.25630- 7 4.73310+ 6 1.26330- 7 5.40920+ 6 1.24050- 7 306 5 91 1746
 6.08540+ 6 1.18260- 7 6.76150+ 6 1.06740- 7 7.43770+ 6 9.16550- 8 306 5 91 1747
 8.11380+ 6 7.73420- 8 8.79000+ 6 6.31410- 8 9.46620+ 6 5.03360- 8 306 5 91 1748
 1.01420+ 7 3.82110- 8 1.08180+ 7 2.80630- 8 1.14950+ 7 1.83210- 8 306 5 91 1749
 1.21710+ 7 9.47770- 9 1.28470+ 7 3.84580- 9 1.35230+ 7 0.0     + 0 306 5 91 1750
 0.0     + 0 1.60000+ 7           0           0           1          21 306 5 91 1751
          21           2           0           0           0           0 306 5 91 1752
 0.0     + 0 0.0     + 0 7.26190+ 5 6.12780- 8 1.45240+ 6 8.32010- 8 306 5 91 1753
 2.17860+ 6 9.74670- 8 2.90470+ 6 1.07160- 7 3.63090+ 6 1.13450- 7 306 5 91 1754
 4.35710+ 6 1.16840- 7 5.08330+ 6 1.17520- 7 5.80950+ 6 1.15440- 7 306 5 91 1755
 6.53570+ 6 1.10130- 7 7.26190+ 6 9.95950- 8 7.98800+ 6 8.54510- 8 306 5 91 1756
 8.71420+ 6 7.21880- 8 9.44040+ 6 5.88300- 8 1.01670+ 7 4.68950- 8 306 5 91 1757
 1.08930+ 7 3.59580- 8 1.16190+ 7 2.61890- 8 1.23450+ 7 1.70720- 8 306 5 91 1758
 1.30710+ 7 8.82020- 9 1.37980+ 7 3.58150- 9 1.45240+ 7 0.0     + 0 306 5 91 1759
 0.0     + 0 1.70000+ 7           0           0           1          21 306 5 91 1760
          21           2           0           0           0           0 306 5 91 1761
 0.0     + 0 0.0     + 0 7.76220+ 5 5.72320- 8 1.55240+ 6 7.77120- 8 306 5 91 1762
 2.32860+ 6 9.10440- 8 3.10490+ 6 1.00110- 7 3.88110+ 6 1.05990- 7 306 5 91 1763
 4.65730+ 6 1.09180- 7 5.43350+ 6 1.09840- 7 6.20970+ 6 1.07930- 7 306 5 91 1764
 6.98590+ 6 1.03020- 7 7.76220+ 6 9.33130- 8 8.53840+ 6 8.00160- 8 306 5 91 1765
 9.31460+ 6 6.76520- 8 1.00910+ 7 5.54380- 8 1.08670+ 7 4.38870- 8 306 5 91 1766
 1.16430+ 7 3.38080- 8 1.24190+ 7 2.45430- 8 1.31960+ 7 1.59790- 8 306 5 91 1767
 1.39720+ 7 8.24680- 9 1.47480+ 7 3.35060- 9 1.55240+ 7 0.0     + 0 306 5 91 1768
 0.0     + 0 1.80000+ 7           0           0           1          21 306 5 91 1769
          21           2           0           0           0           0 306 5 91 1770
 0.0     + 0 0.0     + 0 8.26240+ 5 5.36910- 8 1.65250+ 6 7.29080- 8 306 5 91 1771
 2.47870+ 6 8.54210- 8 3.30500+ 6 9.39370- 8 4.13120+ 6 9.94670- 8 306 5 91 1772
 4.95750+ 6 1.02470- 7 5.78370+ 6 1.03110- 7 6.60990+ 6 1.01350- 7 306 5 91 1773
 7.43620+ 6 9.67890- 8 8.26240+ 6 8.77730- 8 9.08870+ 6 7.52340- 8 306 5 91 1774
 9.91490+ 6 6.36480- 8 1.07410+ 7 5.22550- 8 1.15670+ 7 4.13800- 8 306 5 91 1775
 1.23940+ 7 3.18690- 8 1.32200+ 7 2.30910- 8 1.40460+ 7 1.50190- 8 306 5 91 1776
 1.48720+ 7 7.74390- 9 1.56990+ 7 3.14800- 9 1.65250+ 7 0.0     + 0 306 5 91 1777
 0.0     + 0 1.90000+ 7           0           0           1          21 306 5 91 1778
          21           2           0           0           0           0 306 5 91 1779
 0.0     + 0 0.0     + 0 8.76270+ 5 5.05600- 8 1.75250+ 6 6.86600- 8 306 5 91 1780
 2.62880+ 6 8.04500- 8 3.50510+ 6 8.84760- 8 4.38130+ 6 9.36940- 8 306 5 91 1781
 5.25760+ 6 9.65330- 8 4.13390+ 6 9.71550- 8 7.01010+ 6 9.55160- 8 306 5 91 1782
 7.88640+ 6 9.12620- 8 8.76270+ 6 8.28460- 8 9.63900+ 6 7.09860- 8 306 5 91 1783
 1.05150+ 7 6.00840- 8 1.13910+ 7 4.93850- 8 1.22680+ 7 3.92370- 8 306 5 91 1784
 1.31440+ 7 3.01250- 8 1.40200+ 7 2.17990- 8 1.48970+ 7 1.41670- 8 306 5 91 1785
 1.57730+ 7 7.29860- 9 1.66490+ 7 2.96840- 9 1.75250+ 7 0.0     + 0 306 5 91 1786
 0.0     + 0 2.00000+ 7           0           0           1          21 306 5 91 1787
          21           2           0           0           0           0 306 5 91 1788
 0.0     + 0 0.0     + 0 9.26290+ 5 4.77800- 8 1.85260+ 6 6.48870- 8 306 5 91 1789
 2.77890+ 6 7.60330- 8 3.70520+ 6 8.36240- 8 4.63150+ 6 8.85630- 8 306 5 91 1790
 5.55780+ 6 9.12560- 8 6.48410+ 6 9.18580- 8 7.41030+ 6 9.03280- 8 306 5 91 1791
 8.33660+ 6 8.63400- 8 9.26290+ 6 7.84470- 8 1.01890+ 7 6.71980- 8 306 5 91 1792
 1.11160+ 7 5.69010- 8 1.20420+ 7 4.68050- 8 1.29680+ 7 3.72330- 8 306 5 91 1793
 1.38940+ 7 2.85570- 8 1.48210+ 7 2.06460- 8 1.57470+ 7 1.34080- 8 306 5 91 1794
 1.66730+ 7 6.90240- 9 1.76000+ 7 2.80830- 9 1.85260+ 7 0.0     + 0 306 5 91 1795
                                                                     306 5  0 1796
                                                                     306 0  0 1797
 3.00600+ 3 5.96345+ 0           1           0           1           0 30612 52 1798
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........10........20........30........40........50........60......MAT MF MT  SEQ
3.56200+ 6 3.56200+ 6          0          2          1          2 30612 52 1799
         2          2          0          0          0          0 30612 52 1800
4.15931+ 6 1.00000+ 0 2.00000+ 7 1.00000+ 0                        30612 52 1801
                                                                   30612  0 1802
3.00600+ 3 5.96345+ 0          1          0          3          0 30612102 1803
0.0    + 0 0.0    + 0          0          0          1          2 30612102 1804
         2          2          0          0          0          0 30612102 1805
1.00000- 5 1.39000+ 0 2.00000+ 7 1.39000+ 0                        30612102 1806
7.25053+ 6 0.0    + 0          2          2          1          2 30612102 1807
         2          2          0          0          0          0 30612102 1808
1.00000- 5 6.10000- 1 2.00000+ 7 6.10000- 1                        30612102 1809
6.77292+ 6 0.0    + 0          2          2          1          2 30612102 1810
         2          2          0          0          0          0 30612102 1811
1.00000- 5 3.90000- 1 2.00000+ 7 3.90000- 1                        30612102 1812
4.77610+ 5 4.77610+ 5          1          2          1          2 30612102 1813
         2          2          0          0          0          0 30612102 1814
1.00000- 5 3.90000- 1 2.00000+ 7 3.90000- 1                        30612102 1815
                                                                   30612  0 1816
                                                                   306 0  0 1817
3.00600+ 3 5.96345+ 0          1          0          1          0 30614 52 1818
                                                                   30614  0 1819
3.00600+ 3 5.96345+ 0          1          0          3          0 30614102 1820
                                                                   30614  0 1821
                                                                   306 0  0 1822
                                                                     0 0  0 1823
                                                                    -1 0  0    0
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