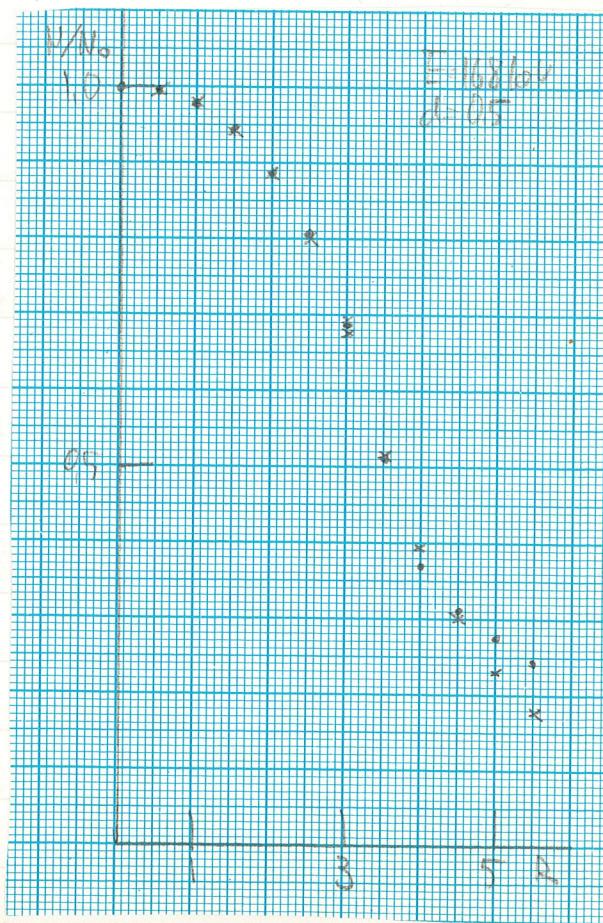


$E=168$ ,  $d=0.5$  non central

$d$	$N$	$N_b$	$N_{bt}$	$\alpha$	$\mu$	$N/N_b$	$1 - \frac{\mu}{N_b}$
0	201645	3323	206215	0	205920	1	0
0.5	200519	3424	205191	0.5	205436	0.9976	0.0024
1	196403	3196	200619	1	201326	0.9977	0.0223
1.5	190089	3171	194255	1.5	193784	0.9411	0.0589
2	179496	2967	183254	2	182774	0.8874	0.1126
2.5	161668	2621	164734	2.5	165751	0.8049	0.1951
3	137920	2181	140106	3	141563	0.6875	0.3125
3.5	104490	1678	105670	3.5	105084	0.5103	
4	76140	1474	76918	4	77035	0.3741	
4.5	64027	1370	64591	4.5	64103	0.3113	
5	56000	1234	56792	5	56667	0.2752	
5.5	50557	1302	50985	5.5	50390	0.2447	
0	200700	3450	205424				
-0.5	201083	3387	205681				
-1	197543	3333	207033				
-1.5	189142	3173	193312				
-2	178478	2946	182194				
-2.5	163555	2694	166767				
-3	140658	2269	143020				
-3.5	103076	1799	104498				
-4	76403	1462	77151				
-4.5	62994	1398	63614				
-5	56553	1332	57041				
-5.5	49458	1256	49794				



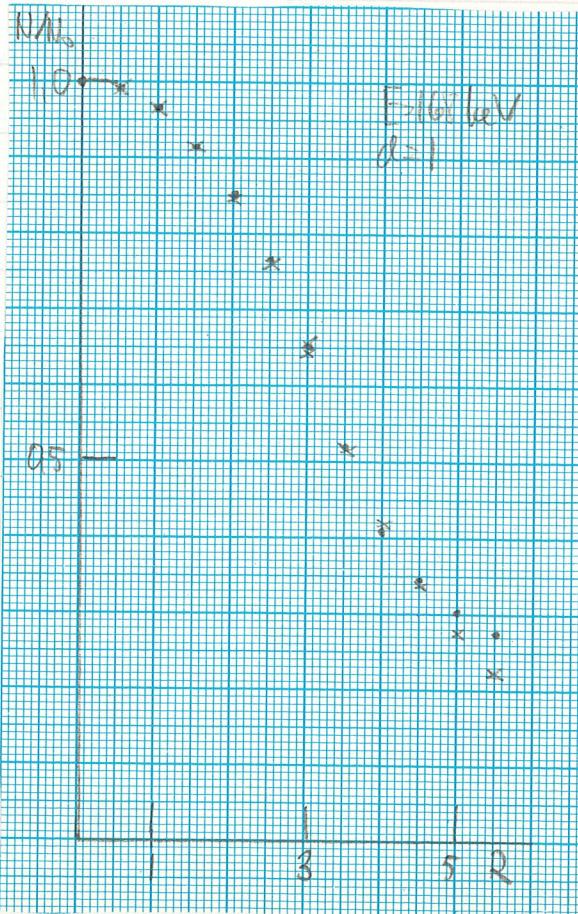
$$1 - \frac{\mu}{N_b} = 0.02162r^{2.4167}$$

W=0      W=1      W=2      W=3  
 0.9960      0.9899      0.9831      0.9761  
 0.9784      0.9723      0.9661      0.9591  
 0.9424      0.9360      0.9291      0.9221  
 0.8846      0.8780      0.8711      0.8641  
 0.8020      0.7950      0.7871      0.7791  
 0.6924      0.6850      0.6778      0.6708  
 0.5142      0.4971      0.4800      0.4629  
 0.3831      0.3659      0.3488      0.3317  
 0.3004      0.2832      0.2660      0.2488  
 0.2296      0.2124      0.1952      0.1780  
 0.1755      0.1683      0.1611      0.1539  
 $r - r_0 \left( \frac{N}{N_b} \right)_r = 0.6728e^{-0.5375(r-r_0)}$ 
 $0.6080213$

6.4.88.

 $E=168$   $d=1$ 

	$N$	$N_p$	$N_{tot}$	$d$	$N$	$NN_0$	$1 - \frac{N}{N_0}$
0	168065	2693	171725	0	171869	27	1
0.5	167792	2689	170494	0.5	170389	0.9914	0.0086
1	162920	2583	165914	1	165850	0.9650	0.0350
1.5	154073	2365	157627	1.5	156946	0.9132	0.0868
2	145486	2226	147762	2	146439	0.8520	0.1480
2.5	130749	1968	132509	2.5	131527	0.7653	0.2347
3	113124	1747	114442	3	112081	0.6521	0.3479
3.5	91497	1573	92467	3.5	89644	0.5216	
4	70908	1448	71128	4	70151	0.4082	
4.5	59885	1312	60333	4.5	59151	0.3442	
5	52180	1283	52570	5	51840	0.3016	
5.5	46726	1210	46970	5.5	46640	0.2714	
-0	159279	2680	172463				
-0.5	167029	2715	170283				
-1	162762	2600	165786				
-1.5	153587	2427	156265				
-2	142789	2251	145115				
-2.5	128797	1962	130545				
-3	108323	1786	109719				
-3.5	85936	1530	86820				
-4	68657	1346	69173				
-4.5	57586	1279	57968				
-5	50697	1294	51109				
-5.5	45996	1295	46310				



$$-0.03759 r^{2.0124}$$

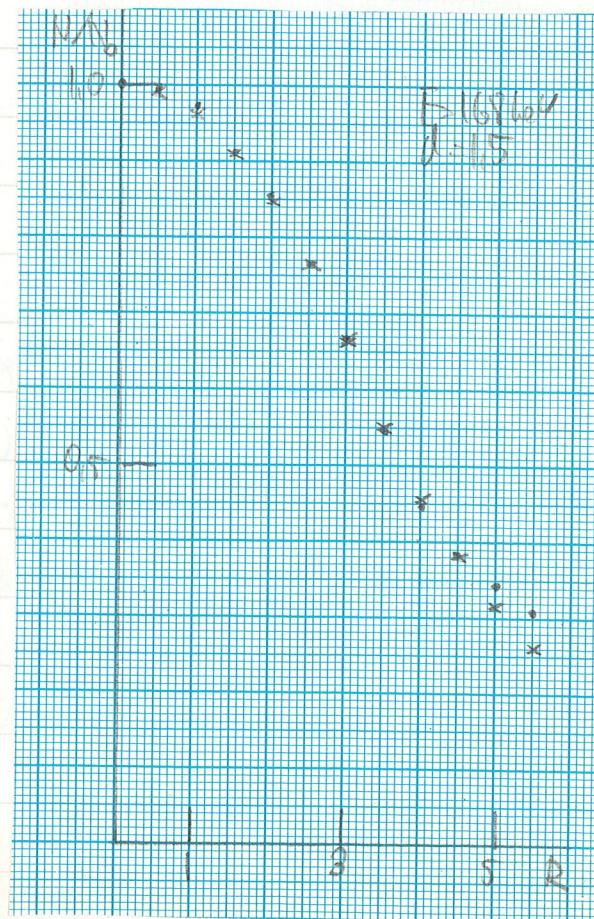
$$\begin{aligned}
 & w=0 & w=0 & w=0 & w=0 \\
 & 0.9906 & 0.9621 & 0.9160 & 0.8483 \\
 & w=0 & w=0 & w=0 & w=0 \\
 & 0.7624 & 0.6570 & 0.53381 & 0.4196 \\
 & w=2 & w=2 & w=2 & w=2 \\
 & 0.9291 & 0.8291 & 0.7283 & 0.6281 \\
 & w=2.5 & w=2.5 & w=2.5 & w=2.5 \\
 & 0.8791 & 0.7791 & 0.6791 & 0.5791 \\
 & w=3 & w=3 & w=3 & w=3 \\
 & 0.8291 & 0.7291 & 0.6291 & 0.5291 \\
 & w=4 & w=4 & w=4 & w=4 \\
 & 0.7791 & 0.6791 & 0.5791 & 0.4791 \\
 & w=5 & w=5 & w=5 & w=5 \\
 & 0.7291 & 0.6291 & 0.5291 & 0.4291 \\
 & w=5.5 & w=5.5 & w=5.5 & w=5.5 \\
 & 0.6791 & 0.5791 & 0.4791 & 0.3791 \\
 & w=6 & w=6 & w=6 & w=6 \\
 & 0.6291 & 0.5291 & 0.4291 & 0.3291 \\
 & w=6.5 & w=6.5 & w=6.5 & w=6.5 \\
 & 0.5791 & 0.4791 & 0.3791 & 0.2791 \\
 & w=7 & w=7 & w=7 & w=7 \\
 & 0.5291 & 0.4291 & 0.3291 & 0.2291 \\
 & w=7.5 & w=7.5 & w=7.5 & w=7.5 \\
 & 0.4791 & 0.3791 & 0.2791 & 0.1791 \\
 & w=8 & w=8 & w=8 & w=8 \\
 & 0.4291 & 0.3291 & 0.2291 & 0.1291 \\
 & w=8.5 & w=8.5 & w=8.5 & w=8.5 \\
 & 0.3791 & 0.2791 & 0.1791 & 0.0791 \\
 & w=9 & w=9 & w=9 & w=9 \\
 & 0.3291 & 0.2291 & 0.1291 & 0.0291 \\
 & w=9.5 & w=9.5 & w=9.5 & w=9.5 \\
 & 0.2791 & 0.1791 & 0.0791 & -0.0191 \\
 & w=10 & w=10 & w=10 & w=10 \\
 & 0.2291 & 0.1291 & 0.0291 & -0.091 \\
 & w=10.5 & w=10.5 & w=10.5 & w=10.5 \\
 & 0.1791 & 0.0791 & -0.0191 & -0.291 \\
 & w=11 & w=11 & w=11 & w=11 \\
 & 0.1291 & -0.091 & -0.291 & -0.491 \\
 & w=11.5 & w=11.5 & w=11.5 & w=11.5 \\
 & 0.0791 & -0.291 & -0.491 & -0.691 \\
 & w=12 & w=12 & w=12 & w=12 \\
 & 0.0291 & -0.491 & -0.691 & -0.891 \\
 & w=12.5 & w=12.5 & w=12.5 & w=12.5 \\
 & -0.0191 & -0.691 & -0.891 & -1.091 \\
 & w=13 & w=13 & w=13 & w=13 \\
 & -0.091 & -0.891 & -1.091 & -1.291 \\
 & w=13.5 & w=13.5 & w=13.5 & w=13.5 \\
 & -0.291 & -1.091 & -1.291 & -1.491 \\
 & w=14 & w=14 & w=14 & w=14 \\
 & -0.491 & -1.291 & -1.491 & -1.691 \\
 & w=14.5 & w=14.5 & w=14.5 & w=14.5 \\
 & -0.691 & -1.491 & -1.691 & -1.891 \\
 & w=15 & w=15 & w=15 & w=15 \\
 & -0.891 & -1.691 & -1.891 & -2.091 \\
 & w=15.5 & w=15.5 & w=15.5 & w=15.5 \\
 & -1.091 & -1.891 & -2.091 & -2.291 \\
 & w=16 & w=16 & w=16 & w=16 \\
 & -1.291 & -2.091 & -2.291 & -2.491 \\
 & w=16.5 & w=16.5 & w=16.5 & w=16.5 \\
 & -1.491 & -2.291 & -2.491 & -2.691 \\
 & w=17 & w=17 & w=17 & w=17 \\
 & -1.691 & -2.491 & -2.691 & -2.891 \\
 & w=17.5 & w=17.5 & w=17.5 & w=17.5 \\
 & -1.891 & -2.691 & -2.891 & -3.091 \\
 & w=18 & w=18 & w=18 & w=18 \\
 & -2.091 & -2.891 & -3.091 & -3.291 \\
 & w=18.5 & w=18.5 & w=18.5 & w=18.5 \\
 & -2.291 & -3.091 & -3.291 & -3.491 \\
 & w=19 & w=19 & w=19 & w=19 \\
 & -2.491 & -3.291 & -3.491 & -3.691 \\
 & w=19.5 & w=19.5 & w=19.5 & w=19.5 \\
 & -2.691 & -3.491 & -3.691 & -3.891 \\
 & w=20 & w=20 & w=20 & w=20 \\
 & -2.891 & -3.691 & -3.891 & -4.091
 \end{aligned}$$

$$r=r_0 \left( \frac{N}{N_0} \right) = 0.6460 e^{-0.4316(r-r_0)}$$

$$E=0.0550$$

$E = 168$  d<sub>212</sub>

	$N$	$N_p$	$N_{\text{tot}}$	$M$	$M$	$N/N_0$	$1 - \frac{N}{N_0}$
0	141204	2245	143518	0	143349	1	0
0.5	141125	2107	143163	0.5	147630	0.9950	0.0050
1	137230	2704	139462	1	139174	0.9709	0.0291
1.5	128849	1932	130539	1.5	130651	0.9114	0.0886
2	120089	1933	121779	2	122352	0.8535	0.1465
2.5	107824	1667	108982	2.5	109698	0.7653	0.2347
3	94673	1575	95647	3	95795	0.6683	0.3317
3.5	75447	1413	76097	3.5	78037	0.5494	
4	64027	1352	64555	4	64051	0.4468	
4.5	55249	1245	55563	4.5	55378	0.3863	
5	47837	1207	48075	5	49023	0.3420	
5.5	43546	1213	43796	5.5	43915	0.3063	
0	140921	2217	143179				
0.5	140091	2091	142097				
-1	(36704	2179	138886				
-1.5	128950	1995	130764				
-2	121273	1914	122925				
-2.5	108984	1803	110414				
-3	94440	1589	95942				
-3.5	79373	1390	79927				
-4	63145	1289	63547				
-4.5	56776	1296	55192				
-5	49648	1249	49970				
5.5	43755	1227	44033				



$$0,03992 r^{1.9255}$$

$$0.9895 \quad w=0$$

$$0.9601 \quad w=0$$

$$0.9128 \quad w=0$$

$$0.8484 \quad w=0$$

$$0.7670 \quad w=2$$

$$0.6689 \quad w=2$$

$$0.5 \quad 0.5489$$

$$1 \quad 0.4565$$

$$1.5 \quad 0.3797$$

$$w=0 \quad 2 \quad 0.3159$$

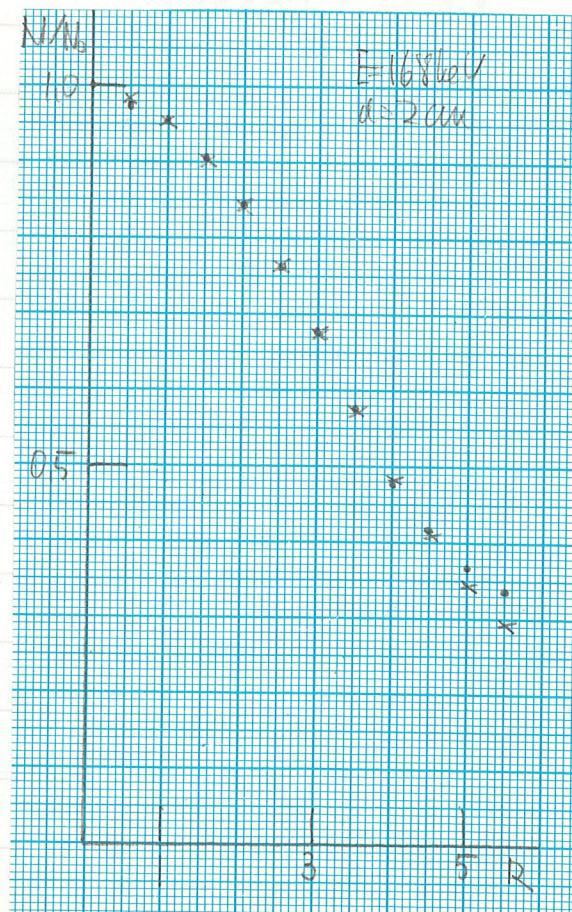
$$w=0 \quad 2.5 \quad 0.2627$$

$$r-r_0 \left(\frac{v}{v_0}\right)_r = 0.6599 e^{-0.3684(r-r_0)}$$

$$D=0.0479$$

$E=168\text{keV}$   $d=2\text{cm}$

N	Np	N <sub>tot</sub>	d	μ	N/N <sub>p</sub>	1 - $\frac{N}{N_p}$
0	119121	1892	120629	0	110079	1
0.5	115913	1885	117507	0.5	117148	0.9756 0.0244
1	113659	1851	115185	1	114475	0.9533 0.0467
1.5	107545	1735	108839	1.5	108713	0.9053 0.0947
2	101378	1672	102546	2	101493	0.8452 0.1548
2.5	90588	1534	91480	2.5	91289	0.7602 0.2398
3	81068	1435	81259	3	81451	0.6783 0.3217
3.5	69070	1360	69614	3.5	69261	0.5768
4	56855	1326	57331	4	57290	0.4771
4.5	49733	1229	50015	4.5	49741	0.4442
5	43880	1200	44105	5	44032	0.3667
5.5	40150	1209	40392	5.5	40190	0.3380
6	117909	1898	119529			
0.5	115523	1721	116789			
1	112434	1755	113768			
1.5	107282	1740	108586			
2	99231	1692	100439			
2.5	90296	1489	91098			
3	80437	1441	81143			
3.5	68329	1376	68905			
4	56708	1358	57248			
4.5	49196	1223	49466			
5	43720	1208	43960			
5.5	40558	1203	40788			



$\rightarrow 0.0459 \text{ r}^{1.783}$

0.9866  $w=0$

0.9541  $w=0$

0.9056  $w=0$

0.8421  $w=0$

0.7650  $w=2$

0.6748  $w=2$

0.5732  $w=0$

0.4851  $w=0$

0.4105  $w=0$

W=0 2

W=0 2.5

W=0 3

W=0 4

W=0 5

W=0 6

W=0 7

W=0 8

W=0 9

W=0 10

W=0 11

W=0 12

W=0 13

W=0 14

W=0 15

W=0 16

W=0 17

W=0 18

W=0 19

W=0 20

W=0 21

W=0 22

W=0 23

W=0 24

W=0 25

W=0 26

W=0 27

W=0 28

W=0 29

W=0 30

W=0 31

W=0 32

W=0 33

W=0 34

W=0 35

W=0 36

W=0 37

W=0 38

W=0 39

W=0 40

W=0 41

W=0 42

W=0 43

W=0 44

W=0 45

W=0 46

W=0 47

W=0 48

W=0 49

W=0 50

W=0 51

W=0 52

W=0 53

W=0 54

W=0 55

W=0 56

W=0 57

W=0 58

W=0 59

W=0 60

W=0 61

W=0 62

W=0 63

W=0 64

W=0 65

W=0 66

W=0 67

W=0 68

W=0 69

W=0 70

W=0 71

W=0 72

W=0 73

W=0 74

W=0 75

W=0 76

W=0 77

W=0 78

W=0 79

W=0 80

W=0 81

W=0 82

W=0 83

W=0 84

W=0 85

W=0 86

W=0 87

W=0 88

W=0 89

W=0 90

W=0 91

W=0 92

W=0 93

W=0 94

W=0 95

W=0 96

W=0 97

W=0 98

W=0 99

W=0 100

W=0 101

W=0 102

W=0 103

W=0 104

W=0 105

W=0 106

W=0 107

W=0 108

W=0 109

W=0 110

W=0 111

W=0 112

W=0 113

W=0 114

W=0 115

W=0 116

W=0 117

W=0 118

W=0 119

W=0 120

W=0 121

W=0 122

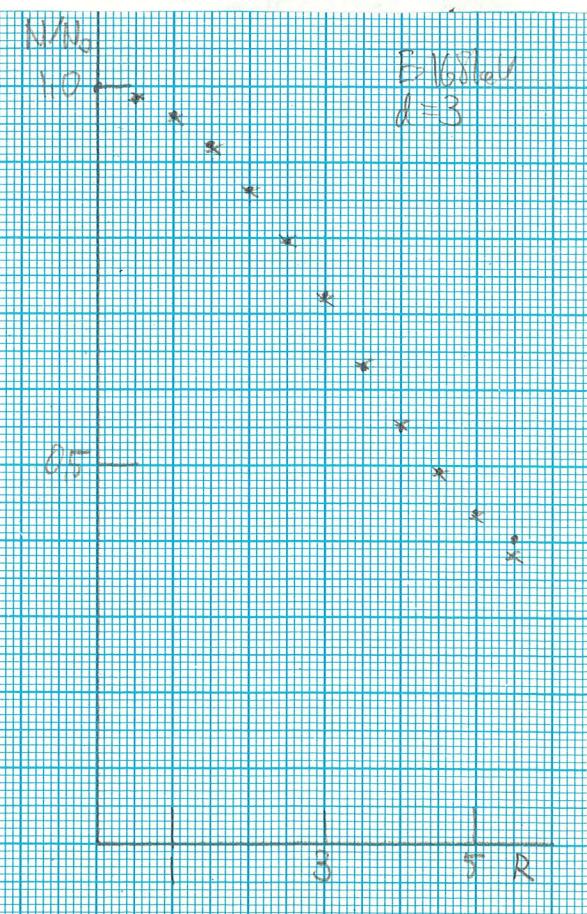
W=0 123

W=0 124

W=0 125

$E=1681\text{eV}$   $d=3\text{au}$

N	N <sub>p</sub>	N <sub>tot</sub>	d	N	U/N <sub>p</sub>	1-NN <sub>p</sub>
0	84657	1461	85403	0	85050	1
0.5	82364	1437	83062	0.5	83584	0.9828
1	79682	1478	80462	1	81834	0.9622
1.5	76972	1407	77610	1.5	78500	0.9230
2	71707	1395	72321	2	73353	0.8625
2.5	65965	1366	66521	2.5	67732	0.7964
3	59889	1328	60369	3	61652	0.7249
3.5	51921	1219	52183	3.5	53698	0.6314
4	44945	1232	45233	4	46879	0.5506
4.5	40525	1223	40795	4.5	42142	0.4950
5	36455	1125	36529	5	37304	0.4386
5.5	34791	1211	34537	5.5	34259	0.4028
6	83905	1481	84697			
6.5	83265	1508	84105			
7	82438	1472	83206			
7.5	78727	1419	79389			
8	73727	1417	74885			
8.5	68238	1440	68942			
9	67425	1343	62935			
9.5	54966	1736	55212			
10	48221	1190	48425			
10.5	43311	1177	43489			
11	37908	1173	38078			
11.5	33771	1193	33981			



$$1 - 0.03767 r^{1.8254}$$

$$0.9894 \quad w=0$$

$$0.9623 \quad w=0$$

$$0.9210 \quad w=0$$

$$0.8665 \quad w=0$$

$$0.7994 \quad w=2$$

$$0.7202 \quad w=2 \quad 0.7202$$

$$0.6336 \quad w=0$$

$$0.5574 \quad w=0$$

$$0.4904 \quad w=0 \quad 0.0046$$

$$0.4314 \quad 0.5 \quad 0.0070 \quad 0.0160$$

$$0.3795 \quad 1 \quad 0.0233 \quad 0.0233$$

$$r-r_0 \left( \frac{U}{U_0} \right) = 0.7202 e^{-0.2563(r-r_0)}$$

$$r=r_0 + 0.0187$$