Comparison of Wiser Code with Data

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Transversity experiment, polarized 3He target.

HRS: E=6.0GeV, E'=2.35GeV, theta=16^o
Wiser calculation assummed isospin symmetry:

	e	π+	π-	K-	π+/e	π-/e	K-/e
Code	NMC (no rad corr)	Wiser	Wiser	Wiser	NMC/Wiser	NMC/Wiser	NMC/Wiser
Rate (calc) (Hz)	9.0	94.06	79.38	9.23	10.45	8.82	1.03
		with decay 78.71	with decay 66.46	2.4	8.75	7.38	0.23
Rate (data) (Hz)	12.4	54.8	34.0	1.34	4.41935	2.74193	0.08

BigBite:

E = 6.0GeV, theta=30^o

Calculation used 0.01GeV bins in E'

E' (central)	e rate NMC (no rad corr)		π+ rate Wiser	π- rate Wiser	π+/e		π-/e	
Code	NMC (no rad corr)	Data	Wiser	Wiser		Data		Data
0.815	58.2	58.7	26356	21029	453	1.3	361	2.7
1.246	40.	28.4	5193	4272	130	3.0	107	3.6
1.612	26.7	13.6	969	810	36	2.9	30	2.4
1.925	21	9.2	228	192	11	2.1	9.1	1.4

PVDIS experiment, 20-cm LD2 target

Radiation length: RL =4.382% (4.502%) for DIS#1(DIS#2)

electron rate: use nmc_org.f(black), F1F2IN09.f (blue)

	e			PI-		PI-/e	
Calculate	DIS#1: 271 269.11	DIS#2: 26.1 26.2		DIS#1: 164	DIS#2: 111	DIS#1: 0.61	DIS#2: 4.25
				After:146.4	95	0.54	3.63
Data	210	18				0.5	3.3

Electron rate calculation with F1F2IN09.f (blue)
Wiser calculation assumed isospin symmetry:
Pion rates: decay corrected.

	E	Theta	E'	R_e [kHz]			Pi-/e		
				Calculation		Data	Calculation		Data
DISI	6.067	12.9	3.66	269.11	271	210	0.54	0.54	0.5
DIS II	6.067	20.	2.63	26.2	26.1	18	3.63	3.6	3.3
RES I	4.867	12.9	4.0	688	814	300	0.0163	0.014	<=0.25
RES II	4.867	12.9	3.55	557	575	600	0.124	0.120	<=0.25
RES III	4.867	12.9	3.1	455	472	400	0.51	0.49	<=0.4
RES IV	6.067	15	3.66	125	128	80	0.42	0.41	<=0.6
RES V	6.067	14	3.66	180	184	130	0.48	0.47	<=0.7