NODE=B046

$\Sigma(1915)\ 5/2^+$

$I(J^P) = 1(\frac{5}{2}^+)$ Status: ****

Discovered by COOL 66. For results published before 1974 (they are now obsolete), see our 1982 edition Physics Letters **111B** 1 (1982). NODE=B046

This entry only includes results from partial-wave analyses. Parameters of peaks seen in cross sections and invariant-mass distributions in this region used to be listed in in a separate entry immediately following. They may be found in our 1986 edition Physics Letters **170B** 1 (1986).

$\Sigma(1915)$ POLE POSITION

NODE=B046225

REAL PART

NODE=B046RE
NODE=B046RE

VALUE (MeV)	DOCUMENT ID		TECN	COMMENT
1885 to 1915 (≈ 1900) OUR ESTIMATE				→ UNCHECKED ←
1908 ± 7	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
1890^{+3}_{-2}	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •				
1897	ZHANG	13A	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15. NODE=B046RE;LINKAGE=A

−2×IMAGINARY PART

NODE=B046IM
NODE=B046IM

VALUE (MeV)	DOCUMENT ID		TECN	COMMENT
90 to 110 (≈ 100) OUR ESTIMATE				→ UNCHECKED ←
98 ± 12	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
$97^{+\ 4}_{-\ 6}$	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •				
133	ZHANG	13A	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15. NODE=B046IM;LINKAGE=B

$\Sigma(1915)$ POLE RESIDUES

NODE=B046250

The normalized residue is the residue divided by $\Gamma_{pole}/2$. NODE=B046250

Normalized residue in $N\overline{K} \to \Sigma(1915) \to N\overline{K}$

NODE=B046A00
NODE=B046A00

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.08 ±0.02	**−33 ± 15**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •					
0.0391	−15	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15. NODE=B046A00;LINKAGE=A

Normalized residue in $N\overline{K} \to \Sigma(1915) \to \Sigma\pi$

NODE=B046A01
NODE=B046A01

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.09 ±0.02	**180 ± 12**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •					
0.157	157	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15. NODE=B046A01;LINKAGE=A

Normalized residue in $N\overline{K} \to \Sigma(1915) \to \Lambda\pi$

NODE=B046A02
NODE=B046A02

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.07 ±0.02	**−170 ± 20**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •					
0.0757	166	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15. NODE=B046A02;LINKAGE=A

Normalized residue in $N\overline{K} \to \Sigma(1915) \to \Xi K$

NODE=B046A03
NODE=B046A03

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.02 ±0.01	**−65 ± 35**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •					
0.002	−88	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15. NODE=B046A03;LINKAGE=A

Normalized residue in $N\overline{K} \to \Lambda(1915) \to \Sigma(1385)\pi$, P-wave

NODE=B046A07
NODE=B046A07

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.02 ±0.02		SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •					
0.0724	161	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046A07;LINKAGE=A

Normalized residue in $N\overline{K} \to \Lambda(1915) \to \Sigma(1385)\pi$, F-wave

NODE=B046A08
NODE=B046A08

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.05 ±0.03	**−30 ± 50**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •					
0.0162	−163	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046A08;LINKAGE=A

Normalized residue in $N\overline{K} \to \Sigma(1915) \to \Lambda(1520)\pi$, D-wave

NODE=B046A11
NODE=B046A11

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.08±0.02	**−105 ± 50**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel

Normalized residue in $N\overline{K} \to \Sigma(1915) \to \Delta\overline{K}$, P-wave

NODE=B046A15
NODE=B046A15

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.12±0.03	**−10 ± 20**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel

Normalized residue in $N\overline{K} \to \Sigma(1915) \to \Delta\overline{K}$, F-wave

NODE=B046A14
NODE=B046A14

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.07±0.02	**−35 ± 25**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel

Normalized residue in $N\overline{K} \to \Sigma(1915) \to \Lambda(1520)\pi$, G-wave

NODE=B046A12
NODE=B046A12

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.01±0.01		SARANTSEV	19	DPWA	$\overline{K}N$ multichannel

Normalized residue in $N\overline{K} \to \Sigma(1915) \to N\overline{K}^*(892)$, S=1/2 , F-wave

NODE=B046A04
NODE=B046A04

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.07 ±0.04	**−60 ± 45**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •					
0.00476	4	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046A04;LINKAGE=A

Normalized residue in $N\overline{K} \to \Sigma(1915) \to N\overline{K}^*(892)$, S=3/2 , P-wave

NODE=B046A05
NODE=B046A05

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
• • • We do not use the following data for averages, fits, limits, etc. • • •					
0.0494	51	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046A05;LINKAGE=A

Normalized residue in $N\overline{K} \to \Sigma(1915) \to N\overline{K}^*(892)$, S=3/2 , F-wave

NODE=B046A06
NODE=B046A06

MODULUS	PHASE (°)	DOCUMENT ID		TECN	COMMENT
0.07 ±0.03	**−40 ± 45**	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •					
0.000314	16	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046A06;LINKAGE=A

$\Sigma(1915)$ MASS

NODE=B046M

VALUE (MeV)	DOCUMENT ID		TECN	COMMENT
1900 to 1935 (≈ 1915) OUR ESTIMATE				→ UNCHECKED ←
1918± 6	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
1920± 7	ZHANG	13A	DPWA	$\overline{K}N$ multichannel
1937±20	ALSTON-...	78	DPWA	$\overline{K}N \to \overline{K}N$
1894± 5	[1] CORDEN	77C		$K^-n \to \Sigma\pi$
1909± 5	[1] CORDEN	77C		$K^-n \to \Sigma\pi$
1920±10	GOPAL	77	DPWA	$\overline{K}N$ multichannel
1920±30	BAILLON	75	IPWA	$\overline{K}N \to \Lambda\pi$
1914±10	HEMINGWAY	75	DPWA	$K^-p \to \overline{K}N$
1920^{+15}_{-20}	VANHORN	75	DPWA	$K^-p \to \Lambda\pi^0$
1920± 5	KANE	74	DPWA	$K^-p \to \Sigma\pi$

NODE=B046M

OCCUR=2

• • • We do not use the following data for averages, fits, limits, etc. • • •

not seen	DECLAIS	77	DPWA	$\overline{K}N \to \overline{K}N$
1925 or 1933	[2] MARTIN	77	DPWA	$\overline{K}N$ multichannel
1900± 4	[3] CORDEN	76	DPWA	$K^- n \to \Lambda\pi^-$
1915	DEBELLEFON	76	IPWA	$K^- p \to \Lambda\pi^0$

[1] The two entries for CORDEN 77C are from two different acceptable solutions.
[2] The two MARTIN 77 values are from a T-matrix pole and from a Breit-Wigner fit.
[3] Preferred solution 3; see CORDEN 76 for other possibilities.

NODE=B046M;LINKAGE=B
NODE=B046M;LINKAGE=C
NODE=B046M;LINKAGE=A

Σ(1915) WIDTH

NODE=B046W

VALUE (MeV)	DOCUMENT ID		TECN	COMMENT
80 to 160 (≈ 120) OUR ESTIMATE				
102±12	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
149±17	ZHANG	13A	DPWA	Multichannel
161±20	ALSTON-...	78	DPWA	$\overline{K}N \to \overline{K}N$
107±14	[1] CORDEN	77C		$K^- n \to \Sigma\pi$
85±13	[1] CORDEN	77C		$K^- n \to \Sigma\pi$
130±10	GOPAL	77	DPWA	$\overline{K}N$ multichannel
70±20	BAILLON	75	IPWA	$\overline{K}N \to \Lambda\pi$
85±15	HEMINGWAY	75	DPWA	$K^- p \to \overline{K}N$
102±18	VANHORN	75	DPWA	$K^- p \to \Lambda\pi^0$
162±25	KANE	74	DPWA	$K^- p \to \Sigma\pi$

NODE=B046W
→ UNCHECKED ←
OCCUR=2

• • • We do not use the following data for averages, fits, limits, etc. • • •

171 or 173	[2] MARTIN	77	DPWA	$\overline{K}N$ multichannel
75±14	[3] CORDEN	76	DPWA	$K^- n \to \Lambda\pi^-$
60	DEBELLEFON	76	IPWA	$K^- p \to \Lambda\pi^0$

[1] The two entries for CORDEN 77C are from two different acceptable solutions.
[2] The two MARTIN 77 values are from a T-matrix pole and from a Breit-Wigner fit.
[3] Preferred solution 3; see CORDEN 76 for other possibilities.

NODE=B046;LINKAGE=B
NODE=B046W;LINKAGE=C
NODE=B046W;LINKAGE=B

Σ(1915) DECAY MODES

NODE=B046215;NODE=B046

	Mode	Fraction (Γ_i/Γ)	
Γ_1	$N\overline{K}$	0.05 to 0.15	DESIG=1
Γ_2	$\Lambda\pi$	(6.0 ±2.0) %	DESIG=2
Γ_3	$\Sigma\pi$	(10.0 ±2.0) %	DESIG=3
Γ_4	ΞK		DESIG=182
Γ_5	$\Sigma(1385)\pi$		DESIG=181
Γ_6	$\Sigma(1385)\pi$, P-wave	(2.0 ±2.0) %	DESIG=4
Γ_7	$\Sigma(1385)\pi$, F-wave	(4.0 ±2.0) %	DESIG=5
Γ_8	$\Lambda(1520)\pi$, D-wave	(8.0 ±2.0) %	DESIG=190
Γ_9	$\Lambda(1520)\pi$, G-wave		DESIG=191
Γ_{10}	$N\overline{K}^*(892)$, S=1/2, F-wave	(5.0 ±3.0) %	DESIG=183
Γ_{11}	$N\overline{K}^*(892)$, S=3/2, P-wave		DESIG=184
Γ_{12}	$N\overline{K}^*(892)$, S=3/2, F-wave	(5.0 ±2.0) %	DESIG=185
Γ_{13}	$\Delta\overline{K}$, P-wave	(16 ±5) %	DESIG=188
Γ_{14}	$\Delta\overline{K}$, F-wave	(5.0 ±3.0) %	DESIG=189

Σ(1915) BRANCHING RATIOS

NODE=B046220

See "Sign conventions for resonance couplings" in the Note on Λ and Σ Resonances.

NODE=B046220

$\Gamma(N\overline{K})/\Gamma_{total}$ Γ_1/Γ

NODE=B046R1

VALUE	DOCUMENT ID		TECN	COMMENT
0.05 to 0.15 OUR ESTIMATE				
0.08 ±0.02	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
0.026±0.004	ZHANG	13A	DPWA	$\overline{K}N$ multichannel
0.03 ±0.02	[1] GOPAL	80	DPWA	$\overline{K}N \to \overline{K}N$
0.14 ±0.05	ALSTON-...	78	DPWA	$\overline{K}N \to \overline{K}N$
0.11 ±0.04	HEMINGWAY	75	DPWA	$K^- p \to \overline{K}N$

NODE=B046R1
→ UNCHECKED ←

• • • We do not use the following data for averages, fits, limits, etc. • • •

0.036	[2] KAMANO	15	DPWA	$\overline{K}N$ multichannel
0.05 ±0.03	GOPAL	77	DPWA	See GOPAL 80
0.08 or 0.08	[3] MARTIN	77	DPWA	$\overline{K}N$ multichannel

[1] The mass and width are fixed to the GOPAL 77 values due to the low elasticity.
[2] From the preferred solution A in KAMANO 15.
[3] The two MARTIN 77 values are from a T-matrix pole and from a Breit-Wigner fit.

NODE=B046;LINKAGE=E
NODE=B046R1;LINKAGE=A
NODE=B046;LINKAGE=C

$\Gamma(\Lambda\pi)/\Gamma_{total}$ Γ_2/Γ

NODE=B046R00
NODE=B046R00

VALUE	DOCUMENT ID	TECN	COMMENT
0.06 ±0.02	SARANTSEV 19	DPWA	$\overline{K}N$ multichannel

• • • We do not use the following data for averages, fits, limits, etc. • • •

0.127	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046R00;LINKAGE=A

$\Gamma(\Sigma\pi)/\Gamma_{total}$ Γ_3/Γ

NODE=B046R01
NODE=B046R01

VALUE	DOCUMENT ID	TECN	COMMENT
0.10 ±0.02	SARANTSEV 19	DPWA	$\overline{K}N$ multichannel

• • • We do not use the following data for averages, fits, limits, etc. • • •

0.678	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046R01;LINKAGE=A

$\Gamma(\Xi K)/\Gamma_{total}$ Γ_4/Γ

NODE=B046R02
NODE=B046R02

VALUE	DOCUMENT ID	TECN	COMMENT
<0.01	SARANTSEV 19	DPWA	$\overline{K}N$ multichannel

• • • We do not use the following data for averages, fits, limits, etc. • • •

not seen	[1] KAMANO	15	DPWA	Multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046R02;LINKAGE=A

$\Gamma(\Sigma(1385)\pi$, P-wave$)/\Gamma_{total}$ Γ_6/Γ

NODE=B046R08
NODE=B046R08

VALUE	DOCUMENT ID	TECN	COMMENT
0.02 ±0.02	SARANTSEV 19	DPWA	$\overline{K}N$ multichannel

• • • We do not use the following data for averages, fits, limits, etc. • • •

0.112	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046R08;LINKAGE=A

$\Gamma(\Sigma(1385)\pi$, F-wave$)/\Gamma_{total}$ Γ_7/Γ

NODE=B046R09
NODE=B046R09

VALUE	DOCUMENT ID	TECN	COMMENT
0.04 ±0.02	SARANTSEV 19	DPWA	$\overline{K}N$ multichannel

• • • We do not use the following data for averages, fits, limits, etc. • • •

0.004	[1] KAMANO	15	DPWA	$\overline{K}N$ multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046R09;LINKAGE=A

$\Gamma(\Lambda(1520)\pi$, D-wave$)/\Gamma_{total}$ Γ_8/Γ

NODE=B046R03
NODE=B046R03

VALUE	DOCUMENT ID	TECN	COMMENT
0.08±0.02	SARANTSEV 19	DPWA	$\overline{K}N$ multichannel

$\Gamma(\Lambda(1520)\pi$, G-wave$)/\Gamma_{total}$ Γ_9/Γ

NODE=B046R04
NODE=B046R04

VALUE	DOCUMENT ID	TECN	COMMENT
∼ 0	SARANTSEV 19	DPWA	$\overline{K}N$ multichannel

$\Gamma(N\overline{K}^*(892)$, S=1/2, F-wave$)/\Gamma_{total}$ Γ_{10}/Γ

NODE=B046R05
NODE=B046R05

VALUE	DOCUMENT ID	TECN	COMMENT
0.05 ±0.03	SARANTSEV 19	DPWA	$\overline{K}N$ multichannel

OCCUR=2

• • • We do not use the following data for averages, fits, limits, etc. • • •

0.001	[1] KAMANO	15	DPWA	Multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046R05;LINKAGE=A

$\Gamma(N\overline{K}^*(892)$, S=3/2, P-wave$)/\Gamma_{total}$ Γ_{11}/Γ

NODE=B046R06
NODE=B046R06

VALUE	DOCUMENT ID	TECN	COMMENT

• • • We do not use the following data for averages, fits, limits, etc. • • •

0.042	[1] KAMANO	15	DPWA	Multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046R06;LINKAGE=A

$\Gamma(N\overline{K}^*(892), S=3/2, F\text{-wave})/\Gamma_{total}$ Γ_{12}/Γ

NODE=B046R07
NODE=B046R07

VALUE	DOCUMENT ID		TECN	COMMENT
0.05±0.02	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel
• • • We do not use the following data for averages, fits, limits, etc. • • •				
not seen	[1] KAMANO	15	DPWA	Multichannel

[1] From the preferred solution A in KAMANO 15.

NODE=B046R07;LINKAGE=A

$\Gamma(\Delta\overline{K}, P\text{-wave})/\Gamma_{total}$ Γ_{13}/Γ

NODE=B046R10
NODE=B046R10

VALUE	DOCUMENT ID		TECN	COMMENT
0.16±0.05	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel

$\Gamma(\Delta\overline{K}, F\text{-wave})/\Gamma_{total}$ Γ_{14}/Γ

NODE=B046R11
NODE=B046R11

VALUE	DOCUMENT ID		TECN	COMMENT
0.05±0.03	SARANTSEV	19	DPWA	$\overline{K}N$ multichannel

$(\Gamma_i\Gamma_f)^{1/2}/\Gamma_{total}$ in $N\overline{K} \to \Sigma(1915) \to \Lambda\pi$ $(\Gamma_1\Gamma_2)^{1/2}/\Gamma$

NODE=B046R2
NODE=B046R2

VALUE	DOCUMENT ID		TECN	COMMENT
−0.09 ±0.03	GOPAL	77	DPWA	$\overline{K}N$ multichannel
−0.10 ±0.01	[1] CORDEN	76	DPWA	$K^- n \to \Lambda\pi^-$
−0.06 ±0.02	BAILLON	75	IPWA	$\overline{K}N \to \Lambda\pi$
−0.09 ±0.02	VANHORN	75	DPWA	$K^- p \to \Lambda\pi^0$
−0.087±0.056	DEVENISH	74B		Fixed-t dispersion rel.
• • • We do not use the following data for averages, fits, limits, etc. • • •				
−0.09 or −0.09	[2] MARTIN	77	DPWA	$\overline{K}N$ multichannel
−0.10	DEBELLEFON	76	IPWA	$K^- p \to \Lambda\pi^0$

[1] Preferred solution 3; see CORDEN 76 for other possibilities.

NODE=B046;LINKAGE=A

[2] The two MARTIN 77 values are from a T-matrix pole and from a Breit-Wigner fit.

NODE=B046R2;LINKAGE=C

$(\Gamma_i\Gamma_f)^{1/2}/\Gamma_{total}$ in $N\overline{K} \to \Sigma(1915) \to \Sigma\pi$ $(\Gamma_1\Gamma_3)^{1/2}/\Gamma$

NODE=B046R3
NODE=B046R3

VALUE	DOCUMENT ID		TECN	COMMENT
−0.14±0.01	ZHANG	13A	DPWA	Multichannel
−0.17±0.01	[1] CORDEN	77C		$K^- n \to \Sigma\pi$
−0.15±0.02	[1] CORDEN	77C		$K^- n \to \Sigma\pi$
−0.19±0.03	GOPAL	77	DPWA	$\overline{K}N$ multichannel
−0.16±0.03	KANE	74	DPWA	$K^- p \to \Sigma\pi$
• • • We do not use the following data for averages, fits, limits, etc. • • •				
−0.05 or −0.05	[2] MARTIN	77	DPWA	$\overline{K}N$ multichannel

OCCUR=2

[1] The two entries for CORDEN 77C are from two different acceptable solutions.

NODE=B046R3;LINKAGE=B

[2] The two MARTIN 77 values are from a T-matrix pole and from a Breit-Wigner fit.

NODE=B046R3;LINKAGE=C

$(\Gamma_i\Gamma_f)^{1/2}/\Gamma_{total}$ in $N\overline{K} \to \Sigma(1915) \to \Sigma(1385)\pi$, P-wave $(\Gamma_1\Gamma_6)^{1/2}/\Gamma$

NODE=B046R4
NODE=B046R4

VALUE	DOCUMENT ID		TECN	COMMENT
<0.01	CAMERON	78	DPWA	$K^- p \to \Sigma(1385)\pi$

$(\Gamma_i\Gamma_f)^{1/2}/\Gamma_{total}$ in $N\overline{K} \to \Sigma(1915) \to \Sigma(1385)\pi$, F-wave $(\Gamma_1\Gamma_7)^{1/2}/\Gamma$

NODE=B046R5
NODE=B046R5

VALUE	DOCUMENT ID		TECN	COMMENT
+0.06 ±0.02	ZHANG	13A	DPWA	Multichannel
+0.039±0.009	[1] CAMERON	78	DPWA	$K^- p \to \Sigma(1385)\pi$

[1] The published sign has been changed to be in accord with the baryon-first convention.

NODE=B046;LINKAGE=F

Σ(1915) REFERENCES

NODE=B046

SARANTSEV	19	EPJ A55 180	A.V. Sarantsev *et al.*	(BONN, PNPI)	REFID=59986
KAMANO	15	PR C92 025205	H. Kamano *et al.*	(ANL, OSAK)	REFID=57507
ZHANG	13A	PR C88 035205	H. Zhang *et al.*	(KSU)	REFID=55441
PDG	86	PL 170B 1	M. Aguilar-Benitez *et al.*	(CERN, CIT+)	REFID=40122
PDG	82	PL 111B 1	M. Roos *et al.*	(HELS, CIT, CERN)	REFID=41167
GOPAL	80	Toronto Conf. 159	G.P. Gopal	(RHEL) IJP	REFID=31755
ALSTON-...	78	PR D18 182	M. Alston-Garnjost *et al.*	(LBL, MTHO+) IJP	REFID=31751
Also		PRL 38 1007	M. Alston-Garnjost *et al.*	(LBL, MTHO+) IJP	REFID=31752
CAMERON	78	NP B143 189	W. Cameron *et al.*	(RHEL, LOIC) IJP	REFID=31837
CORDEN	77C	NP B125 61	M.J. Corden *et al.*	(BIRM) IJP	REFID=32326
DECLAIS	77	CERN 77-16	Y. Declais *et al.*	(CAEN, CERN) IJP	REFID=31885
GOPAL	77	NP B119 362	G.P. Gopal *et al.*	(LOIC, RHEL) IJP	REFID=31750
MARTIN	77	NP B127 349	B.R. Martin, M.K. Pidcock, R.G. Moorhouse	(LOUC+) IJP	REFID=31762
Also		NP B126 266	B.R. Martin, M.K. Pidcock	(LOUC)	REFID=31763
Also		NP B126 285	B.R. Martin, M.K. Pidcock	(LOUC) IJP	REFID=31764
CORDEN	76	NP B104 382	M.J. Corden *et al.*	(BIRM) IJP	REFID=32325
DEBELLEFON	76	NP B109 129	A. de Bellefon, A. Berthon	(CDEF) IJP	REFID=32158
BAILLON	75	NP B94 39	P.H. Baillon, P.J. Litchfield	(CERN, RHEL) IJP	REFID=32089
HEMINGWAY	75	NP B91 12	R.J. Hemingway *et al.*	(CERN, HEIDH, MPIM) IJP	REFID=31930
VANHORN	75	NP B87 145	A.J. van Horn	(LBL) IJP	REFID=32093
Also		NP B87 157	A.J. van Horn	(LBL) IJP	REFID=32094
DEVENISH	74B	NP B81 330	R.C.E. Devenish, C.D. Froggatt, B.R. Martin	(DESY+)	REFID=30036
KANE	74	LBL-2452	D.F. Kane	(LBL) IJP	REFID=31759
COOL	66	PRL 16 1228	R.L. Cool *et al.*	(BNL)	REFID=31861