

## CITATIONS

### of the works of Prof. Dr. Pavel Petkov

#### A1) SOME M1 TRANSITION STRENGTHS IN ODD-A NUCLEI AWAY FROM CLOSED SHELLS

W. Andrejtscheff, L. K. Kostov, L. G. Kostova, P. Petkov, M. Senba, N. Tsoupas, Z. Z. Ding and C. Tuniz

**Nuclear Physics A445 (1985) 515-533**

1. M.R.Bhat and D.E.Alburger, Nucl. Data Sheets 53 (1988) 1 -[A1]
2. H.Prade, W.Enghardt, L.Funke, L.Käubler, R.Schwenger and G.Winter, Ann. Rep. Rossendorf 1988, ZfK-667 (1989) 36 -[A1]
3. H.W.Müller, Nucl. Data Sheets 59 (1990) 869 -[A1]
4. S.Rastikerdar, W.Gelletly, B.J.Varley and I.S.Grant, J. Phys. G 22 (1996) 1037 -[A1]
5. K.Abusaleem and B.Singh, Nuclear Data Sheets 112 (2011) 133 - [A1]
6. C.M.Baglin, Nuclear Data Sheets 114 (2013) 1293-1495 -[A1]

#### A2) TWO-QUASIPROTON AND TWO-QUASINEUTRON EXCITATIONS IN THE TRANSITIONAL NUCLEI $^{102,104,106}\text{Pd}$

W. Andrejtscheff, L. K. Kostov, L. G. Kostova, P. Petkov, H. Rotter, W. D. Fromm, H. Prade and F. Stary

**Nuclear Physics A448 (1986) 301-314**

1. O.K.Vorov and V.G.Zelevinski, Proc. 21<sup>th</sup> Winter School of Leningrad, Nucl. Phys. Institute (1986) - [A2]
2. O.K.Vorov, Inst. of Nucl. Phys. of the Siberian Department of the Academy of Sciences of USSR, Preprint 86-170 (1986) -[A2]
3. R.Sefzig, Dissertation, Universität zu Köln (1986) -[A2]
4. B.Fogelberg, A.M.Bruce and D.D.Warner, Nucl. Phys. A475 (1987) 301 -[A2]
5. D. de Frenne, E.Jacobs, M.Verboten and G. de Smet, Nucl. Data Sheets 53 (1988) 73 -[A2]
6. V.M.Kartashov, Proc. 38<sup>th</sup> Meeting on Nucl. Spectroscopy in Baku (1988), p.83 -[A2]
7. R.B.Begshanov, V.M.Belenkiy, I.I.Zalubovskiy and A.V.Kuznichenko, "Transitional Atomic Nuclei" (in Russ.), FAN Publishing House, Tashkent 1988 -[A2]
8. D. De Frenne and A.Negret, Nuclear Data Sheets 109 (2008) 943 -[A2]
9. D. De Frenne, Nuclear Data Sheets 110 (2009) 1745 - [A2]

A3) A MIXED SYMMETRY OR QUASINEUTRON PAIR INTERPRETATION OF THE  $K^\pi = 0_3^+$  LEVEL IN  $^{172}\text{Yb}$

W. Andrejtscheff, P. Petkov, Ch. Protochristov, L. K. Kostov, W.D. Hamilton and F. Hoyler

**Journal of Physics G: Nuclear Physics 12 (1986) L151-156**

1. P.O.Lipas and I.Koivistonen, JYFL Annual Report 1987, p.52 -[A3]
2. P.O.Lipas, P.Toivonen and E.Hammarein, Nucl. Phys. A469 (1987) 323 -[A3]
3. Wang Gonggiwg, Nucl. Data Sheets 51 (1987) 577 -[A3]
4. P.O.Lipas, P. von Brentano and A.Gelberg, Rep. Prog. Phys. 53 (1990) 1355 -[A3]
5. P.C.Sood, D.M.Heally and R.K.Sheline, At. Data Nucl. Data Tables 47 (1991) 89 -[A3]
6. B.Singh, Nucl. Data Sheets 75 (1995) 199 -[A3]
7. D.G.Burke, V.G.Soloviev, A.V.Sushkov and N.Y.Shirikova, Nucl. Phys. A656 (1999) 287 -[A3]

A4) LIFETIME MEASUREMENTS AND PARTICLE-CORE COUPLING CALCULATIONS IN  $^{144}\text{Sm}$

L. K. Kostov, W. Andrejtscheff, L. G. Kostova, P. Petkov, W. Enghardt, H. Prade, H. Rotter and F. Stary

**Zeitschrift fur Physik A: Atoms and Nuclei 325 (1986) 293-297**

1. R.Wirowski, J.Yan, P. von Brentano, A.Dewald and A.Gelberg, J. Phys. G14 (1987) L195 -[A4]
2. R.B.Begshanov, V.M.Belenkiy, I.I.Zalubovskiy and A.V.Kuznichenko, "Transitional Atomic Nuclei" (in Russ.), FAN Publishing House, Tashkent 1988 -[A4]
3. J.K.Tuli, Nucl. Data Sheets 56 (1989) 607 -[A4]
4. R.A.Gatenby, E.L.Johnson, E.M.Baum, S.W.Yates, D.Wang, J.R.Vanhoy, M.T.McEllis, T.Belgya, b.Fazekas and G.Molnar, Nucl. Phys. A560 (1993) 633 -[A4]

A5) LIFETIME INVESTIGATIONS OF  $0^+$  STATES IN SOME  $A > 100$  NUCLEI

W. Andrejtscheff, P. Petkov, Ch. Protochristov, L. K. Kostov, W.D. Hamilton and F. Hoyler

in: *Nuclear Structure, Reactions and Symmetries*, vol.2, eds. R.A.Meyer and V.Paar, (World Scientific 1986), p.726-732

A6) ABSOLUTE E0, E1 AND E2 TRANSITION RATES IN EVEN-EVEN NUCLEI OBTAINED IN THERMAL NEUTRON CAPTURE

P. Petkov, W. Andrejtscheff, Ch. Protochristov, W.D. Hamilton, F. Hoyler and V.V. Martynov

**Journal of Physics G: Nuclear Physics 14 (1988) S97-102**

1. B.Singh, Nucl. Data Sheets 75 (1995) 199 -[A6]

A7)  $p - n$  MULTIPLETS AND BAND-LIKE STRUCTURES IN  $^{106}\text{Ag}$

W. Andrejtscheff, L.K. Kostov, L.G. Kostova, P. Petkov, A. Dewald, J. Eberth, K.O. Zell, P. von Brentano, L. Funke and E. Will

**Zeitschrift fur Physik A: Atoms and Nuclei 331 (1988) 433-438**

A8) MULTIPLET STRUCTURES AND CORE-RELATED EFFECTS ON TRANSITION RATES IN  $^{87}\text{Y}$  AND NEIGHBOURING  $A \approx 90$  NUCLEI

L.K. Kostov, W. Andrejtscheff, L.G. Kostova, P. Petkov, L. Funke, L.Kaubler and H. Prade

**Zeitschrift fur Physik A: Atoms and Nuclei 330 (1988) 45-50**

1. H.Sievers, Nucl. Data Sheets 62 (1991) 327 -[A8]
2. G.Mukherjee and A.A.Sonzogni, Nucl. Data Sheets 105 (2005) 419 -[A8]
3. P.Guazzoni, M.Jaskola, L.Zetta, J.N.Gu A.Vitturi, G.Graw, R.Hertenberger, P.Schiemenz, B.Valnion, U. Atzrott and G.Staudt, Eur. Phys. J A 1 (1998) 365 - [A8]
4. B.Singh, J.Chen, Nuclear Data Sheets 116 (2014) 1 - [A8]
5. E.A.McCutchan, A.A.Sonzogni, Nuclear Data Sheets 115 (2014) 135 - [A8]

A9) THE ELIMINATION OF PROMPT COMPONENTS IN DELAYED COINCIDENCE TIME DISTRIBUTIONS

P. Petkov, W. Andrejtscheff, L.K. Kostov and L.G. Kostova

**Nuclear Instruments and Methods in Physics Research A 271 (1988) 617-623**

A10) RESONANT AMPLIFICATION OF NEUTRINO TRANSITIONS IN THE SUN: EXACT ANALYTICAL RESULTS

S. Toshev and P. Petkov

in: *5<sup>th</sup> Force- Neutrino Physics*, eds. O.Fackler and J.Tran Thanh Van, (Editions Frontieres, 1988) 7p.

A11) CORE-RELATED EFFECTS ON ELECTROMAGNETIC TRANSITION STRENGTHS IN MEDIUM-MASS NUCLEI

W. Andrejtscheff, L.K. Kostov, P. Petkov and Y. Sy Savane

in: *Nuclear Structure of the Zirconium Region*, eds. J.Eberth, R.A.Meyer and K.Systemich, (Springer Verlag, 1988), p.137-142

A12) ELECTRIC QUADRUPOLE TRANSITION STRENGTHS OF THE TYPE  $6_1^+ \rightarrow 4_1^+$  IN  $^{106-112}\text{Sn}$

W. Andrejtscheff, L.K. Kostov, P. Petkov, Y. Sy Savane, Ch. Stoyanov, P. von Brentano, J. Eberth, R. Reinhardt and K.O. Zell

**Nuclear Physics A505 (1989) 397-416**

1. A.I.Vdovin, R.R.Safonov and V.Y.Ponomarev, Izv. AN SSSR (ser. fiz.) 54 (1990) 1816 -[A12]

2. H.Grawe, R.Schubart, D.Alber, R.Alfier, D.B.Fossan, J.Heese, H.Kluge, K.H.Maier and M.Schramm, Prog. Part. Nucl. Phys., Vol. 28 (1992) 281 -[A12]

3. R.Schubart, D.Alber, H.Grawe, J.Grebosz, J.Heese, H.Kluge, K.H.Maier, M.Schramm, D.B.Fossan, L.Käubler, H.Rotter, J.Kownacki and D.Severyniak, Proc. Conf. Nuclei Far From Stability G/AMCO 9, Bernkastel 1992, Inst. Phys. Conf. Series 132 (1993) 527 -[A12]

4. T.Ischii, A.Makashina, M.Nakajama, M.Ogawa, M.Ischii, Y.Saito and S.Garnsomsart, Z.Phys. A 343 (1992) 261 -[A12]

5. D. de Frenne and E.Jacobs, Nucl. Data Sheets 72 (1994) 1 -[A12]

6. A.Makishima, T.Ischii, M.Nakayima, M.Ogawa and M.Ischii, Z.Phys. A 349 (1994) 133 -[A12]

7. L.Käubler, H.Prade, J.Reif, R.Schwenger, G.Winter, H.Grawe, J.Heese, H.Kluge, K.H.Maier, R.Schubart and K.M.Spohr, Phys. Scr. T56 (1995) 266 -[A12]

8. R.Schubart, H.Grawe, J.Heese, H.Kluge, K.H.Maier and M.Schramm, Z. Phys. A 352 (1995) 373 -[A12]

9. P.Guazzoni, L.Zetta, A.Covello, A.Gargano, B.F.Bayman, G.Graw, R.Hertenberger, H.F.Wirth and M.Jaskola, Phys. Rev. C 74 (2006) 054606 -[A12]
10. A.Kumar, J.N.Orce, S.R.Lesher, C.J.McKay, M.T.McEllistrem and S.W.Yates, Phys. Rev. C 72 (2005) 034313 -[A12]
11. Y.N.Lobach, L.Käubler, R.Schwengner and A.A.Pasternak, Phys. Rev. C 59 (1999) 1975 -[A12]
12. L.Käubler, Y.N.Lobach, V.V.Trishin, A.A.Pasternak, M.F.Kudojarov, H.Prade, J.Reif, R.Schwengner, G.Winter, J.Bломqvist and J.Doring, Z. Phys. A 358 (1997) 303 -[A12]
13. S.Juutinen, E.Makela, R.Julin, M.Piiparinen, S.Tormanen, A.Virtanen, E.Adamides, A.Atac, J.Bломqvist, B.Cederwall, C.Fahlander, E.Ideguchi, A.Johnson , W.Karczmarczyk, J.Kownacki, S.Mitarai, L.O.Norlin, J.Nyberg, R.Schubart, D.Seweryniak and G.Sletten, Nucl. Phys. A 617 (1997) 74 -[A12]
14. H.Grawe, R.Schubart, K.H.Maier and D.Seweryniak, Phys. Scripta T56 (1995) 71 -[A12]
15. M.Ishii, T.Ishii, A.Makishima, M.Ogawa, G.Momoki and K.Ogawa, Phys. Scripta T56 (1995) 89 -[A12]
16. D.S.Chuu and S.T.Hsieh, Prog. Theor. Phys. 93 (1995) 727 -[A12]
17. A.Makishima, T.Ishii, M.Nakajima, M.Ogawa, M.Ishii, Z. Phys. A 349 (1994) 133 - [A12]
18. T.Ishii, A.Makishima, M.Nakajima, M.Ogawa, M.Ishii, Y.Saito and S.Garnsomsart, Z. Phys. A 343 (1992) 261 - [A12]
19. D. De Frenne and A.Negret, Nuclear Data Sheets 109 (2008) 943 - [A12]
20. P.Guazzoni, L.Zetta, A.Covello, A.Gargano, B.F.Bayman, G.Graw, R.Hertenberger, H.-F.Wirth, T.Faestermann, and M.Jaskola, Phys. Rev. C 85 (2012) 054609 -[A12]
21. G.Guerdal and F.G.Kondev, Nuclear Data Sheets 113 (2012) 1315 -[A12]

#### A13) RDDS LIFETIME MEASUREMENTS IN THE Xe, Ba AND Ce ISOTOPES AROUND A = 130 USING THE DIFFERENTIAL DECAY CURVE METHOD

A. Dewald, P. Petkov, R. Wrzal, G. Siems, P. Sala, G. Böhm, A. Gelberg, K.O. Zell, P. von Brentano, P.J. Nolan, A.J. Kirwan, D.J. Bishop, R. Julin, A. Lampinen and J. Hattula

in: *Proceedings of the XXV Zakopane School on Physics, vol.2:"Selected topics in Nuclear Structure"*, eds. J.Styczen and Z. Stachura, (World Scientific 1990), p.152-179

1. D.Weil, Dissertation, Universität zu Köln (1996) -[A13]
2. S.Raman, C.W.Nestor and P.Tikkanen, Atomic Data and Nuclear Data Tables 78 (2001) 1 -[A13]
3. B.Saha, Dissertation, Universität zu Köln (2004) - [A13]

4. J.C.Walpe, B.F.Davis, S.Naguleswaran, W.Reviol, U.Garg, Xing-Wang Pan, Da Hsuan Feng, J.X.Saladin, Phys. Rev. C 52 (1995) 1792 - [A13]

A14) ELECTROMAGNETIC PROPERTIES OF SOME ODD-ODD NUCLEI IN THE A ≈ 100 REGION AND IBFFM DESCRIPTION OF  $^{106}\text{Ag}$

W. Andrejtscheff, L.K. Kostov, P. Petkov, S. Brant, V. Paar, V. Lopac, G. Böhm, J. Eberth, R. Wirowski and K.O. Zell  
**Nuclear Physics A516 (1990) 157-188**

1. G.Maino, A.Ventura, A.M.Bizzeti-Sona and P.Biasi, Z.Phys. A 340 (1991) 241 -[A14]
2. B.Cowell, P.Chowdhury, D.J.Blumenthal, P.J.Ennis, S.J.Freeman, C.J.Lister, S.Smolen and Ch.Winter, Phys. Rev. C45 (1992) 1564 -[A14]
3. G.Maino, Int. J. Mod. Phys. E 6 (1997) 287 -[A14]
4. N.M.Stewart and F.S.Radhi, Z. Phys. A 354 (1996) 261 -[A14]
5. A.M.Bizzeti-Sona, P.Biasi, A.A.Stefanini, G.Maino, and A.Ventura, Z. Phys. A 352 (1995) 247 -[A14]
6. E.Browne and J.K.Tuli, Nuclear Data Sheets 112 (2011) 275 - [A14]

A15) E1 AND M1 TRANSITION STRENGTHS FROM TWO-QUASIPARTICLE STRUCTURES IN  $^{168}\text{Er}$

P. Petkov, W. Andrejtscheff, J. Copnell and S. Robinson  
**Nuclear Physics A533 (1991) 49-70**

1. V.G.Soloviev, JINR-E4-93-223, Inv. Talk, 8<sup>th</sup> International Symposium on Capture Gamma-Ray Spectroscopy and Related Topics, ed. J.Kern, World Scientific (1993) p.103 -[A15]
2. V.G.Soloviev, A.V.Sushkov and N.Y.Shirikova, Izv. AN (ser. fiz.) 57 (1993) 10 -[A15]
3. V.G.Soloviev, A.V.Sushkov and N.Yu.Shirikova, Int. J. Mod. Phys. E3 (1994) 1227 -[A15]
4. V.G.Soloviev, Phys. Rev. C51 (1995) R2885 -[A15]
5. P.Thakur, M.S.Behra, R.Dogra, A.K.Bhati and S.C.Bedi, J. Phys. Sciences 57 (2002) 591 -[A15]
6. V.G.Soloviev, A.V.Sushkov and N.Y.Shirikova, Phys. Atom. Nuclei 64 (2001) 1199 -[A15]
7. V.G.Soloviev, A.V.Sushkov and N.Y.Shirikova, Phys. Part. Nuclei 31 (2000) 385 -[A15]

8. V.G.Soloviev, A.V.Sushkov and N.Y.Shirikova, Int. J. Mod. Phys. E 6 (1997) 437 -[A15]
9. V.G.Soloviev, A.V.Sushkov and N.Y.Shirikova, Z. Phys. A 358 (1997) 287 -[A15]
10. N.Petralla, O.Beck, J.Besserer, P. von Brentano, T.Eckert, R.Fischer, C.Fransen, R.D.Herzberg, D.Jager, R.V.Jolos, U.Kneissl, B.Krischok, J.Margraf, H.Maser, A.Nord, H.H.Pitz, M.Rittner, A.Schiller and A.Zilges, Nucl. Phys. A 618 (1997) 141 -[A15]
11. V.G.Soloviev and A.V.Sushkov, Phys. Atom. Nuclei 57 (1994) 1304 -[A15]
12. V.G.Soloviev, A.V.Sushkov and N.Y.Shirikova, J. Phys. G 20 (1994) 113 -[A15]
13. C.M.Baglin, Nuclear Data Sheets 111 (2010) 1807 - [A15]

A16) NUCLEAR STRUCTURE OF  $^{176}\text{Lu}$  AND ITS ASTROPHYSICAL CONSEQUENCES. I. LEVEL SCHEME OF  $^{176}\text{Lu}$

N. Klay, F. Käppeler, H. Beer, G. Schatz, H. Börner, F. Hoyler, S.J. Robinson, K. Screckenbach, B. Krusche, U. Mayerhofer, G. Hlawatsch, H. Lindner, T. von Egidy, W. Andrejtscheff and P. Petkov

**Physical Review C44 (1991) 2801-2838**

1. D.G.Burke, P.C.Sood, P.E.Garett, Tao Qu, R.K.Sheline and R.W.Hoff, Phys. Rev. C47 (1993) 131 -[A16]
2. R.W.Hoff, Proc. 4<sup>th</sup> Intern. Conf. Sel. Top. Nucl. Structure, ed. V.G.Soloviev, Dubna 1994, JINR-94-370, pp.183-192 -[A16]
3. P.Alexa, J. de Boer, I.Hrivnacova, J.Kvasil, M.Loewe and J.Materna, 5<sup>th</sup> Intern. Spring Seminar on Nucl. Phys. (Abstracts), Ravello, May 22-26, 1996, Universita di Napoli "Federico I", Dipartimento di Scienze Fisiche, p.77 -[A16]
4. M.S.Basunia, Nucl. Data Sheets 107 (2006) 791 -[A16]
5. P.M.Walker and G.D.Dracoulis, Hyp. Int. 135 (2001) 83 -[A16]
6. E.Sheldon, Acta Phys. Pol. B 33 (2002) 243 -[A16]
7. T.R.McGoram, G.D.Dracoulis, T.Kibedi, A.P.Byrne, R.A.Bark, A.M.Baxter and S.M.Mullins, Phys. Rev. C62 (2000) 031303 -[A16]
8. J.Vanhorenbeeck, J.M.Lagrange, M.Pautrat, J.S.Dionisio and C.Vieu, Phys. Rev. C 62 (2000) 015801 -[A16]
9. A.Covello, A.Gargano and N.Itaco, Phys. Rev. C56 (1957) 3092 -[A16]
10. I.Huseby, T.S.Tveter, L.Bergholt, M.Guttormsen, E.Melby, J.Rekstad, S.Siem and R.K.Sheline, Phys. Rev. C 55 (1997) 1805 -[A16]
11. T.S.Tveter, L.Bergholt, J.Rekstad, N.Guttormsen and R.K.Sheline, Acta Phys. Pol. B 26 (1995) 383 -[A16]
12. G.Gosselin, P.Morel and P.Mohr, Phys. Rev. C 81 (2010) 055808 - [A16]

13. V.Gintautas, A.E.Champagne, F.G.Kondev and R.Longland, Phys. Rev. C 80 (2009) 015806 - [A16]
14. J.Ketelaer, G.Audi, T.Beyer, K.Blaum, M.Block, R.B.Cakirli, R.F.Casten, C.Droese, M.Dworschak, K.Eberhardt, M.Eibach, F.Herfurth, E.M.Ramirez, S.Nagy, D.Neidherr, W.Nortershauser, C.Smorra, and M.Wang, Phys. Rev. C 84 (2011) 014311 - [A16]
15. C.R.Gould and E.I.Sharapov, Phys. Rev. C 85 (2012) 024610 -[A16]
16. B.H.Li, Z.H.Zhang and Y.A.Lei, Chinese Physics C 37 (2013) 014101 -[A16]
17. O.Trippella, M.Busso, E.Maiorca, F.Kappeler, S.Palmerini, Astrophysical Journal 787 (2014) 41 -[A16]

A17) PICOSECOND LIFETIME MEASUREMENTS AND COLLECTIVE TRANSITION STRENGTHS IN  $^{128}\text{Ba}$

P. Petkov, S. Harissopoulos, A. Dewald, M. Stolzenwald, G. Böhm, P. Sala, K. Schiffer, A. Gelberg, K.O. Zell, P. von Brentano and W. Andrejtscheff  
**Nuclear Physics A543 (1992) 589-612**

1. H.Sakamoto, Phys. Rev. C 64 (2001) 024303 -[A17]
2. S.Raman, C.W. Nestor and P.Tikkanen, Atom. Data Nucl. Data Tables 78 (2001) 1 -[A17]
3. A.D.Efimov and V.M.Mikhailov, Izv. Akad. Nauk Fiz. 64 (2000) 834 -[A17]
4. A.D.Efimov and V.M.Mikhailov, Phys. Rev. C 59 (1999) 3153 -[A17]
5. M.Sugita, K.Uchiyama and K.Furuno, Phys. Lett. B 440 (1998) 239 -[A17]
6. K.Uchiyama, K.Furuno, T.Shizuma, M.Sugita, M.Kato, Y.Tokita, M.Murasaki, N.Hashimoto, H.Takahashi, T.Komatsubara, K.Matsuura, T.Tanaka and Y.Sasaki, Eur. Phys. J. A 2 (1998)13 -[A17]
7. K.Starosta, C.Droste, T.Morek, J.Srebrny, D.B.Fossan, S.Gundel, J.M.Sears, I.Thorslund, P.Vaska, M.P.Waring, S.G.Rohozinski, W.Satula, U.Garg, S.Naguleswaran, and J.C.Walpe, Phys. Rev. C 55 (1997) 2794 -[A17]
8. D.Weil, Dissertation, Universität zu Köln (1996) - [A17]
9. O.Stuch, Dissertation, Universität zu Köln (1998) - [A17]
10. T.Klemme, Dissertation, Universität zu Köln (1999) - [A17]
11. R.Kumar, R.Devi and S.K.Khosa, Physica Scripta 80 (2009) 045201 - [A17]

A18) COMPLEX TIME DISTRIBUTIONS FROM ISOMERS IN CASCADE: A CASE IN  $^{176}\text{Lu}$

P. Petkov, W. Andrejtscheff and S. Avramov  
**Nuclear Instruments and Methods in Physics Research A 321 (1992) 259-264**

1. M.S.Basunia, Nucl. Data Sheets 107 (2006) 791 - [A18]
2. J.Altmann, Dissertation, Universität zu Köln (1994) - [A18]
- 3.P.Mohr, S.Bisterzo, R.Gallino, F.Kappeler, U.Kneissl, and N.Winckler, Phys. Rev. C 79 (2009) 045804 - [A18]
4. G.Gosselin, P.Morel and P.Mohr, Phys. Rev. C 81 (2010) 055808 - [A18]
5. J.M.Regis, G.Pascovici, J.Jolie, and M.Rudigier, Nucl. Instr. Meth. Phys. Res. A 622 (2010) 83 - [A18]
6. S.Kisyov, MSc Diploma Thesis, Sofia University 2012 - [A18]
7. O.J.Roberts, A.M.Bruce, P.H.Regan, Z.Podolyak, C.M.Townsley, J.F.Smith, K.F.Mulholland, A.Smith, Nucl. Instr. Meth. Phys. Res. A 748 (2014) 91 - [A18]

A19) TRANSITION PROBABILITIES IN TRANSITIONAL NUCLEI IN THE A=130 REGION

A. Dewald, G. Böhm, P. Sala, R. Wrzal, J.Altmann, G. Siems, S.Harissopoulos, D.Lieberz, R.Wirowski, K.O. Zell, A. Gelberg, P. von Brentano, P. Petkov, W. Andrejtscheff, P.J. Nolan, A.J. Kirwan, D.J. Thornley, R. Julin and A. Lampinen

in: *New Nuclear Physics With Advanced Techniques*, Eds. F.A.Beck, S.Kassionides and C.A.Kalfas, (World Scientific, 1992) 19 p.

A20) ELECTROMAGNETIC TRANSITION STRENGTHS IN THE TRANSITIONAL DOUBLY ODD NUCLEUS  $^{198}\text{Au}$

P. Petkov, W. Andrejtscheff, S.J. Robinson, U. Mayerhofer, T. von Egidy, S. Brant, V. Paar and V. Lopac

**Nuclear Physics A554 (1993) 189-208**

1. Zhou Chunmei, Nucl. Data Sheets 74 (1995) 259 -[A20]
2. J.Groger, J.Jolie, R.Krücken, C.W.Beausang, M.Caprio, R.F.Casten, J.Cederkall, J.R.Cooper, F.Corminboeuf, L.Genilloud, G.Graw, C.Gunther, M. de Huu, A.L.Levon, A.Metz, J.R.Novak, N.Warr and T.Wendel, Phys.Rev. C62 (2000) 064304 - [A20]
3. J.Oms, MC.Abreu, C.Bourgeois and F.B.Gil, Nucl. Instr. Meth. A 368 (1996) 403 - [A20]
4. X.L.Huang, Nuclear Data Sheets 110 (2009) 2533 - [A20]

A21) THE DIFFERENTIAL DECAY CURVE METHOD FOR THE ANALYSIS OF DOPPLER SHIFT TIMING EXPERIMENTS

G.Böhm, A.Dewald, P.Petkov and P. von Brentano

**Nuclear Instruments and Methods in Physics Research A 329 (1993)  
248-261**

1. P.Sala, Dissertation, Universität zu Köln (1993) -[A21]
2. M.Kabadiyski, Dissertation, Universität zu Göttingen (1994) -[A21]
3. R.Krücken, Dissertation, Universität zu Köln (1995) -[A21]
4. K.P.Lieb, E.Galindo-Leon and S.Dhar, Hyperfine Interactions 136 (2001) 215 - [A21]
5. C.Y.Wu, D.Cline, A.B.Hayes, M.W.Simon, R.Krücken, J.R.Cooper, C.J.Barton, C.W.Beausang, C.Bialik, M.A.Caprio, R.F.Casten, A.A.Hecht, H.Newman, J.Novak, N.Pietralla, K.Zyromski and N.V.Zamfir, Phys. Rev. C64 (2001) 014307 - [A21]
6. R.Krücken, W.T.Chou, J.R.Cooper, C.W.Beausang, C.J.Barton, M.A.Caprio, R.F.Casten, A.A.Hecht, J.R.Novak, N.Pietralla, A.Wolf and N.V.Zamfir, Phys. Rev. C64 (2001) 017305 - [A21]
7. K.P.Lieb, Prog. Part. Nucl. Phys. 46 (2001) 205 - [A21]
8. R.Krücken, J. Res. Natl. Inst. Stan. 105 (2000) 53 - [A21]
9. S.Skoda, T.Steinhardt, F.Becker, J.Eberth, S.Freund, U.Hermkens, B.Fiedler, M.Kabadiyski, O.Thelen, H.G.Thomas, C.Ender, T.Hartlein, F.Kock, D.Schwalm, A.Jungclaus, K.P.Lieb, D.Kast, C.Teich and T.Servene, Nuovo Cimento A 111 (1998) 669 - [A21]
10. F.Brandolini and R.V.Ribas, Nucl. Instr. Meth. A 417 (1998) 150 - [A21]
11. S.Skoda, F.Becker, T.Burkardt, J.Eberth, S.Freund, U.Hermkens, T.Mylaeus, R.Sefzig, W.Teichert, A.von der Werth, H.Grawe, A.Kuhnert, K.H.Maier, J.Bea and B.Rubio, Nucl. Phys. A 633 (1998) 565 - [A21]
12. D.Bazzacco, Nucl. Phys. A 583 (1995) C191 - [A21]
13. M.A.Caprio, N.V.Zamfir, R.F.Casten, C.J.Barton, C.W.Beausang, J.R.Cooper, A.A.Hecht, R.Krücken, H.Newman, J.R.Novak, N.Pietralla, A.Wolf and K.E.Zyromski, Phys. Rev. C66 (2002) 054310 - [A21]
14. D.L.Balabanski, K.A.Gladniski, G. Lo Bianco, A.Saltarelli, N.V.Zamfir NV, E.A.McCutchan, H.Ai, R.F.Casten, A.Heinz, D.A.Meyer, C.Plettner, J.Qian, V.Werner, E.Williams, B.Akkus, L.Amon, R.B.Cakirli, M.N.Erduran, Y.Oktem, S.F.Ashley, P.H.Regan and G.Rainovski, Int. J. Mod. Phys. E 15 (2006) 1735 - [A21]
15. E.Williams, C.Plettner, E.A.McCutchan, H.Levine, N.V.Zamfir, R.B.Cakirli, R.F.Casten, H.Ai, C.W.Beausang, G.Gurdal, A.Heinz, J.Qian, D.A.Meyer, N.Pietralla and V.Werner, Phys. Rev. C 74 (2006) 024302 - [A21]
16. E.A.McCutchan, N.V.Zamfir, R.F.Casten, H.Ai, H.Amro, M.Babilon, D.S.Brenner, G.Gurdal, A.Heinz, R.O.Hughes, D.A.Meyer, C.Plettner, J.Qian, J.J.Ressler, N.J.Thomas, V.Werner, E.Williams and R.Winkler, Phys. Rev. C 73 (2006) 034303 - [A21]
17. K.Andgren, S.F.Ashley, P.H.Regan, E.A.McCutchan, N.V.Zamfir, L.Amon, R.B.Cakirli, R.F.Casten, R.M.Clark, G.Gurdal, K.L.Keyes, D.A.Meyer, M.N.Erduran, A.Papenberg, N.Pietralla, C.Plettner, G.Rainovski, R.V.Ribas, N.J.Thomas, J.Vinson,

- D.D.Warner, V.Werner and E.Williams, J. Phys. G 31 (2005) S1563 - [A21]
18. H.Hubel, Prog. Part. Nucl. Phys. 54 (2004) 1 - [A21]
  19. E.A.McCutchan, N.V.Zamfir, R.F.Casten, M.A.Caprio, H.Ai, H.Amro, C.W.Beausang, A.A.Hecht, D.A.Meyer and J.J.Ressler, Phys. Rev. C 71 (2005) 024309 - [A21]
  20. E.A.McCutchan, N.V.Zamfir, M.A.Caprio, R.F.Casten, H.Amro, C.W.Beausang, D.S.Brenner, A.A.Hecht, C.Hutter, S.D.Langdown, D.A.Meyer, P.H.Regan, J.J.Ressler and A.D.Yamamoto, Phys. Rev. C 69 (2004) 024308 - [A21]
  21. S.F.Ashley, P.H.Regan, K.Andgren, E.A.McCutchan, N.V.Zamfir, L.Amon, R.B.Cakirli, R.F.Casten, R.M.Clark, W.Gelletly, G.Gurdal, K.L.Keyes, D.A.Meyer, M.N.Erduran, A.Papenberg, N.Pietralla, C.Plettner, G.Rainovski, R.V.Ribas, N.J.Thomas, J.Vinson, D.D.Warner, V.Werner, E.Williams, H.L.Liu, and F.R.Xu, Phys. Rev. C 76 (2007) 064302 - [A21]
  22. B.Saha, Dissertation, Universität zu Köln (2004) - [A21]
  23. G.Kemper, Dissertation, Universität zu Köln (2000) - [A21]
  24. R.Peusquens, Dissertation, Universität zu Köln (2000) - [A21]
  25. R.Kühn, Dissertation, Universität zu Köln (1997) - [A21]
  26. D.Weil, Dissertation, Universität zu Köln (1996) - [A21]
  27. A.Fitzler, Dissertation, Universität zu Köln (2002) - [A21]
  28. S.Kasemann, Dissertation, Universität zu Köln (2001) - [A21]
  29. K.Jessen, Dissertation, Universität zu Köln (2003) - [A21]
  30. O.Stuch, Dissertation, Universität zu Köln (1998) - [A21]
  31. T.Klemme, Dissertation, Universität zu Köln (1999) - [A21]
  32. V.Anagnostatou, P.H.Regan, M.R.Bunce, D.McCarthy, V.Werner, T.Ahn, R.J.Casperson, R.Chevrier, N.Cooper, A.Heinz, G.Ilie, M.K.Smith, E.Williams, L.Bettermann, D.Radeck, C.W.Beausang, C.Boniwell, and B.Pauerstein, Acta Phys. Pol. B 42 (2011) 807 - [A21]
  33. C.Michelagnoli, C.A.Ur, E.Farnea, S.Lenzi, S.Lunardi, F.Recchia, N.Marginean, D.Bucurescu, G.Cata-Danil, D.Deleanu, D.Filipescu, D.Ghita, T.Glodariu, R.Marginean, C.Mihai, A.Negret, S.Pascu, T.Sava, L.Stroe, and G.Suliman, Acta Phys. Pol. B 42 (2011) 825 - [A21]
  34. P.G.Bizzeti, J. Phys. Conf. Ser. 267 (2011) 012034 - [A21]
  35. R.Luttke, E.A.McCutchan, V.Werner, K.Aleksandrova, S.Atwater, H.Ai, R.J.Casperson, R.F.Casten, A.Heinz, A.F.Mertz, J.Qian, B.Shoraka, J.R.Terry, E.Williams, and R.Winkler, Phys. Rev. C 85 (2012) 017301 -[A21]
  36. D.Radeck, V.Werner, G.Ilie, N.Cooper, V.Anagnostatou, T.Ahn, L.Bettermann, R.J.Casperson, R.Chevrier, A.Heinz, J.Jolie, D.McCarthy, M.K.Smith, and E.Williams, Phys. Rev. C 85 (2012) 014301 -[A21]
  37. D.M.Cullen, M.G.Procter, and M.J.Taylor, J. Phys. Conf. Ser. 381 (2012) 012075 -[A21]
  38. D.Radeck, Dissertation, Universität zu Köln (2013) - -[A21]
  39. T.Pissulla, Dissertation, Universität zu Köln (2014) - -[A21]

40. P.G.Bizzeti, A.M.Bizzeti-Sona, Nucl. Instr. Meth. Phys. Res. A 736 (2014) 179 -[A21]

A22) ASYMMETRY VERSUS SYMMETRIC QUADRUPOLE DEFORMATION  
IN EVEN-EVEN NUCLEI WITH  $94 \leq A \leq 192$

W.Andrejtscheff and P.Petkov

**Physical Review C 48 (1993) 2531-2533**

1. N.Pietralla, P. von Brentano, R.F.Casten, T.Otsuka and N.V.Zamfir, Phys. Rev. Lett. 73 (1994) 2962 -[A22]
2. B.J.Cole, H.G.Miller and R.M.Quick, Mod. Phys. Lett. A 13 (1998) 2705 - [A22]
3. B.L.Wang, Chinese Phys. Lett. 14 (1997) 503 - [A22]
4. R.V.Jolos, P. von Brentano, N.Pietralla and I.Schneider, Nucl. Phys. A 618 (1997) 126 - [A22]
5. L.Esser, U.Neuneyer, R.F.Casten, and P. von Brentano, Phys. Rev. C 55 (1997) 206 - [A22]
6. R.V.Jolos and P. von Brentano, Phys. Lett. B 381 (1996) 7 - [A22]
7. M.Koizumi, A.Seki, Y.Toh, M.Oshima, A.Osa, A.Kimura, Y.Hatsukawa, T.Shizuma, T.Hayakawa, M.Matsuda, J.Katakura, T.Czosnyka, M.Sugawara, T.Morikawa, and H.Kusakari, Eur. Phys. J. A 18 (2003) 87 - [A22]
8. J.L.Wood, A.M.Oros-Peusquens, R.Zaballa, J.M.Allmond and W.D.Kulp, Phys. Rev. C 70 (2004) 024308 - [A22]
9. J.M.Allmond, R.Zaballa, A.M.Oros-Peusquens, W.D.Kulp and J.L.Wood, Phys. Rev. C 78 (2008) 014302 - [A22]
10. C.Nair, A.R.Junghans, M.Erhard,D.Bemmerer, R.Beyer, E.Grosse, K.Kosev, M.Marta, G.Rusev, K.D.Schilling, R.Schwengner and A.Wagner, Phys. Rev. C 81 (2010) 055806 - [A22]
11. M.Erhard, A.R.Junghans, C.Nair, R.Schwengner, R.Beyer, J.Klug, K.Kosev, A.Wagner and E.Grosse, Phys. Rev. C 81 (2010) 034319 - [A22]
12. E.Grosse, A.Junghans, F.Becvar, E.Birgersson, R.Massarczyk, and G.Schramm, European Physical Journal Conferences 8 (2010) - [A22]
13. R.Beyer, E.Birgersson, A.R.Junghans, R.Massarczyk, G.Schramm, R.Schwengner, and E.Grosse, Int. J. Mod. Phys. E 20 (2011) 431 - [A22]
14. X.D.Liu, Y.Shi and F.R.Xu, Science China-Physics Mechanics and Astronomy 54 (2011) 1811 - [A22]
15. A.R.Junghans, R.Beyer, G.Rusev, R.Schwengner, A.Wagner and E. Grosse, Journal of the Korean Physical Society 59 (2011) 1872 - [A22]
16. E.Grosse, A.R.Junghans, R.Massarczyk, R.Schwengner, and G.Schramm, EPJ Web of Conferences 21 (2012) 04003 -[A22]

17. J.M.Allmond, Phys. Rev. C 88 (2013) 041307 -[A22]
18. F.R.Xu, H.L.Liu, Y.Shi, H.L.Wang, P.M.Walker, S.Frauendorf, and J.C.Pei, Acta Physica Polonica B 44 (2013) 271-282 -[A22]

A23) RDDS MEASUREMENTS OF COLLECTIVE E2 TRANSITION STRENGTHS  
IN  $^{122}\text{Xe}$

P. Petkov, R. Krücken, A. Dewald, P. Sala, G. Böhm, A. Gelberg, P. von Brentano  
R.V.Jolos and W. Andrejtscheff,  
**Nuclear Physics A568 (1994) 572-600**

1. D.Weil, Dissertation, Universität zu Köln (1996) -[A23]
2. S.Raman, C.W.Nestor and P.Tikkanen, Atom. Data Nucl. Data Tables 78 (2001) 1 - [A23]
3. M.Sugita, K.Uchiyama and K.Furuno, Phys. Lett. B 440 (1998) 239 - [A23]
4. J.DeGraaf, M.Cromaz, T.E.Drake, V.P.Janzen, D.C.Radford and D.Ward, Phys. Rev. C 58 (1998) 164 - [A23]
5. S.Raman, J.A.Sheikh and K.H.BHATT, Phys. Rev. C 52 (1995) 1380 - [A23]
6. D.Hirata, H.Toki and I.Tanihata, Nucl. Phys. A 589 (1995) 239 - [A23]
7. T.Tamura, Nucl. Data Sheets 108 (2007) 455 - [A23]
8. O.Stuch, Dissertation, Universität zu Köln (1998) - [A23]
9. T.Pissulla, Dissertation, Universität zu Köln (2014) - -[A23]

A24) EVIDENCE FOR STRONG GROUND-STATE SHAPE ASYMMETRY IN EVEN GERMANIUM AND SELENIUM ISOTOPES

W.Andrejtscheff and P.Petkov

**Physics Letters B 329 (1994) 1-4**

1. A.Jung, S.Lindenstruth, H.Schacht, B.Starck, R.Stock, C.Wesselborg, R.D.Heil, U.Kneissl, J.Margraf, H.Pitz and F.Steiper, Nucl. Phys. A584 (1995) 103 -[A24]
2. B.Singh, Nucl. Data Sheets 74 (1995) 63 -[A24]
3. L.Esser, U.Neuneyer, R.F.Casten, and P. von Brentano Phys. Rev. C 55 (1997) 206 - [A24]
4. T.Hayakawa, Y.Toh, M.Oshima, A.Osa, M.Koizumi, Y.Hatsukawa, Y.Utsuno, J.Katakura, M.Matsuda, T.Morikawa, M.Sugawara, and T.Czosnyka, Phys. Rev. C 67 (2003) 064310 - [A24]
5. M.Koizumi, A.Seki, Y.Toh, M.Oshima, A.Osa, A.Kimura, Y.Hatsukawa, T.Shizuma, T.Hayakawa, M.Matsuda, J.Katakura, T.Czosnyka, M.Sugawara, T.Morikawa, and H.Kusakari, Eur. Phys. J. A 8 (2003) 87 - [A24]

6. T.A.War, A.Chandan, R.Devi, S.K.Khosa and A.Bharti, Indian Journal of Pure and Applied Physics 41 (2003) 914 - [A24]
7. Y.R.Shimizu, T.Shoji and M.Matsuzaki, Phys. Rev. C 77 (2008) 024319 - [A24]
8. R.Beyer, E.Birgersson, A.R.Junghans, R.Massarczyk, G.Schramm, R.Schwengner, and E.Grosse, Int. J. Mod. Phys. E 20 (2011) 431 - [A24]
9. T.L.Yang, S.F.Shen, J.Y.Zhu, H.L.Liu, C.F.Jiao, F.H.Hao, and F.R.Xu, Prog. Theor. Phys. 124 (2010) 605 - [A24]
10. K.Heyde and J.L.Wood, Rev. Mod. Phys. 83 (4) (2011) - [A24]
11. S.F.Shen, S.J.Zheng, F.R.Xu and R.Wyss, Phys. Rev. C 84 (2011) 044315 - [A24]
12. X.D.Liu, Y.Shi and F.R.Xu, Science China-Physics Mechanics and Astronomy 54 (2011) 1811 - [A24]
13. G.Schramm, R.Massarczyk, A.R.Junghans, T.Belgya, R.Beyer, E.Birgersson, E.Grosse, M.Kempe, Z.Kis, K.Kosev, M.Krticka, A.Matic, K.D.Schilling, R.Schwengner, L.Szentmiklosi, A.Wagner, and J.L.Weil, Phys. Rev. C 85 (2012) 014311 -[A24]
14. E.Grosse, A.R.Junghans, R.Massarczyk, R.Schwengner, and G.Schramm, EPJ Web of Conferences 21 (2012) 04003 -[A24]
15. D.Verney, B.Tastet, K.Kolos, F.Le Blanc, F.Ibrahim, M.C.Mhamed, E.Cottreau, P.V.Cuong, F.Didierjean, G.Duchene, S.Essabaa, M.Ferraton, S.Franchoo, C.Lau, J.F.Le Du, I.Matea, B.Mouginot, M.Nikura, B.Roussiere, I.Stefan, D.Testov, and J.-C.Thomas, Phys. Rev. C 87 (2013) 054307 -[A24]
16. Y.Toh, C.J.Chiara, E.A.McCutchan, W.B.Walters, R.V.F.Janssens, M.P.Carpenter, S.Zhu, R.Broda, B.Fornal, B.P.Kay, F.G.Kondev, W.Krolas, T.Lauritsen, C.J.Lister, T.Pawlat, D.Seweryniak, I.Stefanescu, N.J.Stone, J.Wrzesinski, K.Higashiyama, and N.Yoshinaga, Phys. Rev. C 87 (2013) 041304 -[A24]
17. R.Massarczyk, G.Schramm, A.R.Junghans, R.Schwengner, M.Anders, T.Belgya, R.Beyer, E.Birgersson, A.Ferrari, E.Grosse, R.Hannaske, Z.Kis, T.Kogler, K.Kosev, M.Marta, L.Szentmiklosi, A.Wagner, and J.L.Weil, Phys. Rev. C 87 (2013) 044306 -[A24]
18. F.R.Xu, H.L.Liu, Y.Shi, H.L.Wang, P.M.Walker, S.Frauendorf, and J.C.Pei, Acta Physica Polonica B 44 (2013) 271-282 -[A24]
19. J.J.Sun, Z.Shi, X.Q.Li, H.Hua, C.Xu, Q.B.Chen, S.Q.Zhang, C.Y.Song, J.Meng, X.G.Wu, S.P.Hu, H.Q.Zhang, W.Y.Liang, F.R.Xu, Z.H.Li, G.S.Li, C.Y.He, Y.Zheng, Y.L.Ye, D.X.Jiang, Y.Y.Cheng, C.He, R.Han, Z.H.Li, C.B.Li, H.W.Li, J.L.Wang, J.J.Liu, Y.H.Wu, P.W.Luo, S.H.Yao, B.B.Yu, X.P.Cao, H.B.Sun, Phys. Lett. B 734 (2014) 308 -[A24]
20. S.P.Hu, H.L.Ma, X.P.Cao, X.G.Wu, H.Q.Zhang, H.Hua, J.J.Sun, H.B.Sun, C.Y.He, Y.Zheng, Y (Zheng, Yun)[ 1 ] ; G.S.Li, C.B.Li, S.H.Yao, B.B.Yu, J.L.Wang, H.W.Li, Y.H.Wu, J.J.Liu, P.W.Luo, C.Xu, Y.Y.Cheng, Phys. Lett. B 732 (2014) 59 -[A24]

A25) ERRORS ARISING FROM NUCLEAR HYPERFINE INTERACTIONS  
ON LIFETIMES DETERMINED BY THE RECOIL DISTANCE DOPPLER SHIFT  
METHOD

P.Petkov

**Nuclear Instruments and Methods in Physics Research A 349 (1994)  
289-291**

1. P.Sala, Dissertation, Universität zu Köln (1993) -[A25]
2. R.Krücken, Dissertation, Universität zu Köln (1995) -[A25]
3. D.Weil, Dissertation, Universität zu Köln (1996) -[A25]
4. R.Krücken, J. Res. Natl. Inst. Stan. 105 (2000) 53 - [A25]
5. A.E.Stuchbery, Nucl. Instr. Meth. A 385 (1997)547 - [A25]
6. A.Dewald, D.Weil, R.Krücken, R.Kühn, R.Peusquens, H.Tiesler, O.Vogel, K.O.Zell, P. von Brentano, D.Bazzacco, C.Rossi-Alvarez, P.Pavan, D. De Acuna, G. De Angelis and M. De Poli, Phys. Rev. C 54 (1996) R2119 - [A25]
7. R.Krücken, A.Dewald, G.Böhm, P.Sala, J.Altmann, K.O.Zell, P. von Brentano, S.A.Forbes, S.M.Mullins, D.J.Thornley, A.J.Kirwan, P.J.Nolan, P.H.Regan and R.Wadsworth, Nucl. Phys. A 589 (1995) 475 - [A25]
8. B.Saha, Dissertation, Universität zu Köln (2004) - [A25]
9. G.Kemper, Dissertation, Universität zu Köln (2000) - [A25]
10. R.Kühn, Dissertation, Universität zu Köln (1997) - [A25]
11. S.Kasemann, Dissertation, Universität zu Köln (2001) - [A25]
12. K.Jessen, Dissertation, Universität zu Köln (2003) - [A25]
13. O.Stuch, Dissertation, Universität zu Köln (1998) - [A25]
14. T.Klemme, Dissertation, Universität zu Köln (1999) - [A25]
15. D.Radeck, A.Blazhev, M.Albers, C.Bernards, A.Dewald, C.Fransen, M.Heidemann, J.Jolie, B.Melon, D.Mucher, T.Pissulla, W.Rother, K.O.Zell, and O.Moller, Phys. Rev. C 80 (2009) 044331 - [A25]
16. M.Seidlitz, P.Reiter, A.Dewald, O.Möller, B.Bruyneel, S.Christen, F.Finke, C.Fransen, M.Gorska, H.Grawe, A.Holler, G.Ilie, T.Kotthaus, P.Kudejova, S.M.Lenzi, S.Mandal, B.Melon, D.Mücher, J.M.Regis, B.Saha, P. von Brentano, A.Wiens and K.O.Zell, Phys. Rev. C 84 (2011) 034318 - [A25]
17. D.Radeck, V.Werner, G.Ilie, N.Cooper, V.Anagnostatou, T.Ahn, L.Bettermann, R.J.Casperson, R.Chevrier, A.Heinz, J.Jolie, D.McCarthy, M.K.Smith, and E.Williams, Phys. Rev. C 85 (2012) 014301 -[A25]
18. M.Hackstein, Dissertation, Universität zu Köln (2013) - -[A25]
19. J.L.Wang, X.G.Wu, C.Y.He, G.S.Li, Q.W.Fan, Y.H.Du, S.P.Hu, Y.Zheng, Y (Zheng Yun)[ 1 ] ; C.B.Li, H.W.Li, J.J.Liu, P.W.Luo, S.H.Yao, Chinese Physics C 38 (2014) 036201 - [A25]
20. L.P.Gaffney, M.Hackstein, R.D.Page, T.Grahn, M.Scheck, P.A.Butler, P.F.Bertone, N.Bree, R.J.Carroll, M.P.Carpenter, C.J.Chiara, A.Dewald, F.Filmer, C.Fransen,

M.Huyse, R.V.F.Janssens, D.T.Joss, R.Julin, F.G.Kondev, P.Niemenen, J.Pakarinen, S.V.Rigby, W.Rother, P. Van Duppen, H.V.Watkins, K.Wrzosek-Lipska, S.Zhu, Phys. Rev. C 89 (2014) 024307 - [A25]

A26) NEW ISOMERS AND TRANSITION STRENGTHS IN  $^{177}\text{Lu}$   
W.Andrejtscheff, P.Petkov, H.Börner and S.Robinson  
in *Proc. 8<sup>th</sup> International Symposium on Capture Gamma-Ray Spectroscopy and Related topics*, Ed. J.Kern, (World Scientific, 1994) pp.352-354

A27) EVOLUTION OF THE TRIAXIAL ASYMMETRY AT VARIATION OF THE SYMMETRIC QUADRUPOLE DEFORMATION  
W.Andrejtscheff, P.Petkov and N.V.Zamfir  
in *Perspectives for the Interacting Boson Model* Eds. R.F.Casten et al., (World Scientific, 1994) pp.405-408

A28) THE NUCLEAR DEORIENTATION EFFECT IN  $^{122}\text{Xe}$  AND  $^{128}\text{Ba}$   
P.Petkov, A.Dewald, A.Gelberg, G.Böhm, P.Sala, P. von Brentano and W.Andrejtscheff  
**Nuclear Physics A589 (1995) 341-362**

1. I.M.Govil, A.Kumar, H.Iyer, H.Li, U.Garg, S.S.Ghugre, T.Johnson, R.Kaczarowski, B.Kharraja, S.Naguleswaran and J.C.Walpe, Phys. Rev. C 57 (1998) 632 - [A28]
2. T.Tamura, Nucl. Data Sheets 108 (2007) 455 - [A28]
3. T.Klug, Dissertation, Universität zu Köln (2000) - [A28]
4. D.Radeck, V.Werner, G.Ilie, N.Cooper, V.Anagnostatou, T.Ahn, L.Bettermann, R.J.Casperson, R.Chevrier, A.Heinz, J.Jolie, D.McCarthy, M.K.Smith, and E.Williams, Phys. Rev. C 85 (2012) 014301 -[A28]
5. V.Werner, G.Ilie, D.Radeck, T.Ahn, C.W.Beausang, L.Bettermann, R.J.Casperson, R.Chevrier, N.Cooper, T.C.Bonniwell, A.Heinz, E.Holland, D.McCarthy, B.Pauerstein, M.K.Smith, J.R.Terry, and E.Williams, J. Phys. Conf. Ser. 366 (2012) 012048 -[A28]
6. D.Radeck, Dissertation, Universität zu Köln (2013) - -[A28]
7. T.Pissulla, Dissertation, Universität zu Köln (2014) - -[A28]

A29) LOW-LYING COLLECTIVE STATES IN  $^{124-132}\text{Ba}$  IN THE FRAMEWORK

OF THE GENERAL COLLECTIVE MODEL

P.Petkov, A.Dewald and W.Andrejtscheff

**Physical Review C 51 (1995) 2511-2529**

1. D.Weil, Dissertation, Universität zu Köln (1996) -[A29]
2. K.Starosta, C.J.Chiara, D.B.Fossan, T.Koike, T.T.S.Kuo, D.R.LaFosse S.G.Rohozinski, C.Droste, T.Morek and J.Srebrny, Phys. Rev. C 65 (2002) 044328 - [A29]
3. H.Sakamoto, Phys. Rev. C 64 (2001) 024303 - [A29]
4. L.Prochniak, K.Zajac, K.Pomorski, S.G.Rohozinski and J.Srebrny, Nucl. Phys. A 648 (1999) 181 - [A29]
5. Y.Kojima, M.Asai, A.Osa, M.Koizumi, T.Sekine, M.Shibata, H.Yamamoto, K.Kawade and T. Tachibana, J. Phys. Soc. Jap. 67 (1998) 3405 - [A29]
6. M.Asai, T.Sekine, A.Osa, M.Koizumi, Y.Kojima, M.Shibata, H.Yamamoto and K.Kawade, Phys. Rev. C 56 (1997) 3045 - [A29]
7. P.O.Hess, Found. Phys. 27 (1997) 1061 - [A29]
8. J.Y.Zhang, R.F.Casten and N.V.Zamfir, Phys. Lett. B 407 (1997) 201 - [A29]
9. R.V.Jolos, P. von Brentano, N.Pietralla and I.Schneider, Nucl. Phys. A 618 (1997) 126 - [A29]
10. G.Cata-Danil, D.Bucurescu, L.Trache, A.M.Oros, M.Jaskola, A.Gollwitzer, D.Hofer, S.Deylitz, B.D.Valnion and G.Graw, Phys. Rev. C 54 (1996) 2059 - [A29]
11. U.Neuneyer, A.Mertens, R.Kühn, I.Wiedenhöver I, O.Vogel, M.Wilhelm, M.Luig, K.O.Zell, A.Gelberg A, P. von Brentano and T.Otsuka, Nucl. Phys. A 607 (1996) 299 - [A29]
12. K.Higashiyama, N.Yoshinaga and K.Tanabe, Phys. Rev. C 67 (2003) 044305 - [A29]
13. R.M.Clark, M.Cromaz, M.A.Deleplanque, M.Descovich, R.M.Diamond, P.Fallon, R.B.Firestone, I.Y.Lee, A.O.Macchiavelli, H.Mahmud, E.Rodriguez-Vieitez, F.S.Stephens FS, and D.Ward, Phys. Rev. C 68 (2003) 037301 - [A29]
14. L.Prochniak, P.Quentin, D.Samsoen, and J.Libert, Acta Phys. Polonica B 34 (2003) 2461 - [A29]
15. K.Kumar and J.B.Gupta, Nucl. Phys. A694 (2001)199 - [A29]
16. R.V.Jolos and P. von Brentano, Phys. Rev. C 76 (2007) 024309 - [A29]
17. E.Guliyev, F.Ertugral and A.A.Kuliev, Eur. Phys. J. A 27 (2006) 313 - [A29]
18. J.F.Zhang, High Energy Physics and Nuclear Physics-Chinese Edition 28 (2004) 116 Suppl. S - [A29]
19. L.Prochniak, P.Quentin, D.Samsoen, and J.Libert, Nucl. Phys. A 730 (2004) 59 - [A29]
20. M.A.Caprio, Phys. Rev. C 68 (2003) 054303 - [A29]
21. S. De Baerdemacker S, K.Heyde and V.Hellemans V, Physi. Rev. C 79 (2009) 034305 - [A29]
22. R.V.Jolos and P. von Brentano, Phys. Rev. C 77 (2008) 064317 - [A29]

23. G.Suliman, D.Bucurescu, R.Hertenberger, H.F.Wirth, T.Faestermann, R.Krücken, T.Behrens, V.Bildstein, K.Eppinger, C.Hinke, M.Mahgoub, P.Meierbeck, M.Reithner, S.Schwertel and N.Chauvin, Eur. Phys. J. A 36 (2008) 243 - [A29]
24. B.Mohammed-Azizi and D.E.Medjadi, J. Phys. G 35 (2008) 035101 - [A29]
25. O.Stuch, Dissertation, Universität zu Köln (1998) - [A29]
26. Y.Singh, C.Bihari, A.K.Varshney, S.K.Dhiman, K.K.Gupta and D.K.Gupta, Canadian Journal of Physics 88 (2010) 201 - [A29]
27. R.Kumar, R.Devi and S.K.Khosa, Physica Scripta 80 (2009) 045201 - [A29]
28. S.Pascu, G.Cata-Danil, D.Bucurescu, N.Marginean, C.Muller, N.V.Zamfir, G.Graw, A.Gollwitzer, D.Hofer and B.D.Valnion, Phys. Rev. C 81 (2010) 014304 - [A29]
29. R.V.Jolos and P. von Brentano, Phys. Rev. C 79 (2009) 044310 - [A29]
30. M.Gerceklioglu, Phys. Rev. C 82 (2010) 024306 - [A29]
31. R.V.Jolos and P. von Brentano, Physics of Atomic Nuclei 75 (2012) 411 -[A29]
32. Z.Zenginerler, E.Guliyev, A.A.Kuliev, H.Yakut, and G.Soluk, Eur. Phys. J. A 49 (2013) 107 -[A29]
33. T.Pissulla, Dissertation, Universität zu Köln (2014) - -[A29]

A30) LEVEL SCHEME AND ELECTROMAGNETIC TRANSITION STRENGTHS  
IN  $^{177}\text{Lu}$

P.Petkov, W.Andrejtscheff, H.G.Börner, S.J.Robinson, N.Klay and S.Yamada  
**Nuclear Physics A599 (1996) 505-544**

1. T.Hayakawa, Y.Toh, M.Oshima, M.Matsuda, Y.Hatsukawa, N.Shinohara, H.Iimura, T.Shizuma, Y.H.Zhang, M.Sugawara, H.Kusakari, Phys. Lett. B 551 (2003) 79 - [A30]
2. S.Singh, S.S.Malik, A.K.Jain and B.Singh, At. Data Nucl. Data Tables 92 (2006) 1 - [A30]
3. Z.H.Zhang, Y.A.Lei and J.Y.Zeng, Phys. Rev. C 80 (2009) 034313 - [A30]
4. S.Deepa, K.V.Sai, R.Gowrishankar, and K.Venkataramiah, Eur. Phys. J. A 48 (2012) 126 -[A30]

A31) DYNAMIC SHAPE ASYMMETRY IN SOFT NUCLEI  
W.Andrejtscheff, P.Petkov, A.Dewald, G.Böhm and P. von Brentano  
**Physical Review C53 (1996) 1606-1612**

1. A.D.Efimov and V.M.Mikhajlov, Phys. Rev. C 59 (1999) 3153 - [A31]

2. A.D.Efimov and V.M.Mikhajlov, Izv. Akad. Nauk Ser. Fiz. 64 (2000) 834 - [A31]  
 3. I.Sankowska, C.Droste, E.Grodner, T.Morek, J.Srebrny, A.A.Pasternak, J.Kownacki, P.Napiorkowski, S.G.Rohozinski, M.Kowalczyk, M.Kisielinski, R.Kaczarowski and E.Ruchowska E, Eur. Phys. J. A 37 (2008) 169 - [A31]

A32) LOWEST FOUR-QUASIPARTICLE MAGNETIC DIPOLE BAND IN  $^{128}\text{Ba}$   
 O.Vogel, A.Dewald, P. von Brentano, J.Gableske, R.Krücken, N.Nicolay, A.Gelberg, P.Petkov, A.Gizon, J.Gizon, D.Bazzacco, C.Rossi-Alvarez, S.Lunardi, P.Pavan, D.R.Napoli, S.Frauendorf and F.Dönau

**Physical Review C56 (1997) 1338-1343**

1. S.Lakshmi, H.C.Jain, P.K.Joshi, Amita, P.Agarwal, A.K.Jain and S.S.Malik, Phys. Rev. C 66 (2002) 041303 - [A32]
2. W.D.Heiss and R.G.Nazmitdinov, J.E.T.P. Lett. 72 (2000) 106 - [A32]
3. J.N.Orce, A.M.Bruce, A.Emmanouilidis, A.P.Byrne, G.D.Dracoulis, T.Kibedi, M.Caamano, H.El-Masri, C.J.Pearson, Z.Podolyak, P.D.Stevenson, P.M.Walker, F.R.Xu, D.M.Cullen and C.Wheldon, Phys. Rev. C 74 (2006) 034318 - [A32]
4. R.Kumar, R.Devi and S.K.Khosa, Physica Scripta 80 (2009) 045201 - [A32]
5. A.Bharti, S.Singh and S.K.Khosa, Pramana-Journal of Physics 74 (2010) 525 - [A32]
6. A.Bharti, S.Singh, and S.K.Khosa, Int. J. Mod. Phys. E 20 (2011) 1183 - [A32]
7. H.J.Li, Z.G.Xiao, S.J.Zhu, E.Y.Yeoh, Y.X.Liu, Y.Sun, Z.Zhang, R.S.Wang, H.Yi, W.H.Yan, Q.Xu, X.G.Wu, C.Y.He, Y.Zheng, G.S.Li, C.B.Li, H.W.Li, J.J.Liu, S.P.Hu, J.L.Wang, and S.H.Yao, Phys. Rev. C 87 (2013) 057303 - [A32]
8. C.Sharma, P.Verma, S.Singh, A.Bharti, and S.K.Khosa, AIP Conference Proceedings 1524 (2013) 97-100 - [A32]

A33) DETAILED ANGULAR CORRELATION ANALYSIS WITH  $4\pi$  SPEC-TROMETERS: SPIN DETERMINATIONS AND MULTIPOLARITY MIXING MEASUREMENTS IN  $^{128}\text{Ba}$

I.Wiedenhöver, O.Vogel, H.Klein, A.Dewald, P. von Brentano, J.Gableske, R.Krücken, N.Nicolay, A.Gelberg, P.Petkov, A.Gizon, J.Gizon, D.Bazzacco, C.Rossi-Alvarez, G.de Angelis, S.Lunardi, P.Pavan, D.R.Napoli, S.Frauendorf, F.Dönau, R.V.F.Janssens and M.P.Carpenter

**Physical Review C58 (1998) 721-728**

1. A.E.Stuchbery and M.P.Robinson, Nucl. Instr. Meth. A 485 (2002) 753 - [A33]
2. R.M.Clark and A.O.Macchiavelli, Nucl. Phys. A 682 (2001) 415C - [A33]
3. R.M.Clark and A.O.Macchiavelli, Annu. Rev. Nucl. Part. Sc. 50 (2000) 1 - [A33]
4. Amita, A.K.Jian and B.Singh, Atom. Data Nucl. Data Tables 74 (2000) 283 - [A33]
5. C.B.Moon, T.Komatsubara and K.Furuno, J. Korean Phys. Soc. 43 (2003) 574 - [A33]
6. T.Ahn, N.Pietralla, G.Rainovski, A.Costin, K.Dusling, T.C.Li, A.Linnemann and S.Pontillo, Phys. Rev. C 75 (2007) 014313 - [A33]
7. G.Rainovski, D.L.Balabanski and V.I.Dimitrov, Phys. Rev. C 72 (2005) 029801 - [A33]
8. E.Williams, R.J.Casperson, V.Werner, H.Ai, P.Boutachkov, M.Chamberlain, G.Gurdal, A.Heinz, E.A.McCutchan, J.Qian and R.Winkler, Phys. Rev. C 80 (2009) 054309 - [A33]
9. R.Kumar, R.Devi and S.K.Khosa, Physica Scripta 80 (2009) 045201 - [A33]

A34) IN-BAND M1 AND E2 TRANSITION RATES AND COLLECTIVE STRUCTURES IN  $^{128}\text{Ba}$

P.Petkov, J.Gableske, O.Vogel, A.Dewald, P. von Brentano, R.Krücken, R.Peusquens, N.Nicolay, A.Gizon, J.Gizon, D.Bazzacco, C.Rossi-Alvarez, S.Lunardi, P.Pavan, D.R.Napoli, W.Andrejtscheff and R.V.Jolos

**Nuclear Physics A640 (1998) 293-321**

1. J.Srebrny, C.Droste, T.Morek, K.Starosta, A.A.Wasilewski, A.A.Pasternak, E.O.Podsvirova, Y.N.Lobach, G.H.Hagemann, S.Juutinen, M.Piiparinne, S.Tormanen and A.Virtanen, Nucl. Phys. A 683 (2001) 21 - [A34]
2. A.A.Pasternak, Y.Sasaki, A.D.Efimov, V.M.Mikhajlov, T.Hayakawa, Y.Toh, M.Oshima, Y.Hatsukawa, J.Katakura, N.Shinohara, Z.Liu and K.Furuno, Eur. Phys. J. A 9 (2000) 293 - [A34]
3. V.I.Dimitrov, F.Dönau and S.Frauendorf, Phys. Rev. C 62 (2000) 024315 - [A34]
4. C.B.Moon, T.Komatsubara and K.Furuno, J. Korean Phys. Soc. 43 (2003) 574 - [A34]
5. D.L.Balabanski, K.A.Gladnishki, G. Lo Bianco, A.Saltarelli, N.V.Zamfir, E.A.McCutchan, H.Ai, R.F.Casten, A.Heinz, D.A.Meyer, C.Plettner, J.Qian, V.Werner, E.Williams, B.Akkus, L.Amon, R.B.Cakirli, M.N.Erduran, Y.Oktem, S.F.Ashley, P.H.Regan and G.Rainovski, Int. J. Mod. Phys. E 15 (2006) 1735 Sp. Iss. SI - [A34]
6. G.Rainovski, D.L.Balabanski and V.I.Dimitrov, Phys. Rev. C 72 (2005) 029801

- [A34]
  - 7. B.Saha, Dissertation, Universität zu Köln (2004) - [A34]
  - 8. G.Kemper, Dissertation, Universität zu Köln (2000) - [A34]
  - 9. R.Kumar, R.Devi and S.K.Khosa, Physica Scripta 80 (2009) 045201 - [A34]
  - 10. S.Y.Wang, B.Qi, L.Liu, S.Q.Zhang, H.Hua, X.Q.Li, Y.Y.Chen, L.H.Zhu, J.Meng, S.M.Wyngaardt, P.Papka, T.T.Ibrahim, R.A.Bark, P.Datta, E.A.Lawrie, J.J.Lawrie, S.N.T.Majola, P.L.Masiteng, S.M.Mullins, J.Gal, G.Kalinka, J.Molnar, B.M.Nyako, J.Timar, K.Juhasz, and R.Schwengner, Phys. Lett. B. 703 (2011) 40 - [A34]
  - 11. G.Rainovski, DSc Thesis, Sofia University 2012 - [A34]
  - 12. M.Hackstein, Dissertation, Universität zu Köln (2013) - -[A34]
  - 13. T.Pissulla, Dissertation, Universität zu Köln (2014) - -[A34]
  - 14. J.L.Wang, X.G.Wu, C.Y.He, G.S.Li, Q.W.Fan, Y.H.Du, S.P.Hu, Y.Zheng, Y (Zheng Yun)[ 1 ] ; C.B.Li, H.W.Li, J.J.Liu, P.W.Luo, S.H.Yao, Chinese Physics C 38 (2014) 036201 - [A34]

A35) ON THE LINESHAPE IN THE RECOIL DISTANCE METHOD  
 D.Tonev, P.Petkov, J.Gableske, S.Schell, R.Kühn, A.Dewald, P. von Brentano and W.Andrejtscheff  
**Balkan Physics Letters, Special Issue 1998, 273-276**

A36) COLLECTIVITY AND SHAPES AT LOW SPIN  
 W.Andrejtscheff and P.Petkov  
**Balkan Physics Letters, Special Issue 1998, 107-122**

A37) HIGH SPIN STATES IN  $^{128}\text{Ba}$   
 O.Vogel, R.S.Chakrawarthy, A.Dewald, P.Petkov, K.Jessen, J.Gableske, P. von Brentano, D.Bazzacco, A.Gizon, J.Gizon, S.Lunardi, D.R.Napoli, P.Pavan, C.Rossi-Alvarez and I.Wiedenhöver  
**European Physical Journal A4 (1999) 323-325**

1.Al-Khatib, A.K.Singh, H.Hubel, P.Bringel, A.Burger, J.Domscheit, A.Neusser-Neffgen, G.Schoenwasser, G.B.Hagemann, C.R.Hansen, B.Herskind, G.Sletten, J.N.Wilson, J.Timar, A.Algora, Z.Dombradi, J.Gal, G.Kalinka, J.Molnar, B.M.Nyako, D.Sohler,

- L.Zolnai, R.M.Clark, M.Cromaz, P.Fallon, I.Y.Lee, A.O.Macchiavelli, D.Ward, H.Amro, W.C.Ma, M.Kmiecik, A.Maj, J.Styczen, K.Zuber, K.Hauschild, A.Korichi, A.Lopez-Martens, J.Roccaz, S.Siem, F.Hannachi, J.N.Scheurer, P.Bednarczyk, T.Byrski, D.Curien, O.Dorvaux, G.Duchene, B.Gall, F.Khalfallah, I.Piqueras, J.Robin, A.Gorgen, K.Juhasz, S.B.Patel, A.O.Evans, G.Rainovski, G.Benzoni, A.Bracco, F.Camera, S.Leoni, P.Mason, B.Million, A.Paleni, R.Sacchi, O.Wieland, C.M.Petrache, D.Petrache, G. La Rana, R.Moro, G. De Angelis, J.C.Lisle, B.Cederwall, K.Lagergren, R.M.Lieder, E.Podsvirova, W.Gast, H.Jager and N.Redon, Phys. Rev. C 74 (2006) 014305 - [A37]
2. K.Singh, Z.Naik, R.Kumar, J.Goswamy, D.Mehta, N.Singh, C.R.Prahraj, E.S.Paul, K.P.Singh, R.P.Singh, S.Muralithar, N.Madhavan, J.J.Das, S.Nath, A.Jhingan, P.Sugathan and R.K.Bhowmik, Eur. Phys. J. A 25 (2005) 345 - [A37]
  3. S.Lakshmi, H.C.Jain, P.K.Joshi, I.Mazumdar, R.Palit, A.K.Jain and S.S.Malik, Nucl. Phys. A 761 (2005) 1 - [A37]
  4. G.Rainovski, D.L.Balabanski and V.I.Dimitrov, Phys. Rev. C 72 (2005) 029801 - [A37]
  5. R.Kumar, K.Singh, D.Mehta, N.Singh, S.S.Malik, E.S.Paul, A.Gorgen, S.Chmel, R.P.Singh and S.Muralithar, Eur. Phys. J. A 24 (2005) 13 - [A37]
  6. R.Kumar, R.Devi and S.K.Khosa, Physica Scripta 80 (2009) 045201 - [A37]
  7. K.Higashiyama and N.Yoshinaga, Phys. Rev. C 83 (2011) 034321 - [A37]
  8. T.P.D.Swan, P.M.Walker, Z.Podolyak, M.W.Reed, G.D.Dracoulis, G.J.Lane, T.Kibedi, and M.L.Smith, Phys. Rev. C 85 (2012) 024313 -[A37]
  9. N.Kaur, A.Kumar, G.Mukherjee, A.Singh, S.Kumar, R.Kaur, V.Singh, B.Behera, G.Singh, G (Singh, H.Sharma, S.Kumar, M.K.Raju, P.V.M.Rao, S.Muralithar, R.Singh, R.Kumar, N.Madhvan, R.Bhowmik, Eur. Phys. J. A 50 (2014) 5 - [A37]

#### A38) MAGNETIC DIPOLE BAND IN $^{124}\text{Xe}$

I.Schneider, R.S.Chakrawarthy, I.Wiedenhöver, A.Schmidt, H.Meise, P.Petkov, A.Dewald, P. von Brentano, O.Stuch, K.Jessen, D.Weisshaar, C.Schumacher, O.Vogel, G.Sletten, B.Herskind, M.Bergström and J.Wrzesinski

**Physical Review C60 (1999) 014312**

1. G.Rainovski, D.L.Balabanski, G.Roussev, G. Lo Bianco, G.Falconi, N.Biasi, D.Bazzacco, G. de Angelis, D.R.Napoli, F.Dönau and V.I.Dimitrov, Phys. Rev. C 66 (2002) 014308 - [A38]
2. Z.Y.Shi, Y.Liu and J.P.Sang, Chinese Phys. 10 (2001) 282 - [A38]
3. G.Rainovski, G. Lo Bianco, D.L.Balabanski, G.Roussev, G.Falconi, N.Biasi, D.Bazzacco, G. de Angelis, D.R.Napoli, M.A.Cardona, A.J.Kreiner, H.Somacal, V.I.Dimitrov, J.Y.Zhang and F.Dönau, Acta. Phys. Hung. New Series -Heavy Ion Physyces 12 (2000) 211 - [A38]
4. Z.Z.Li, F.Y.Liu, H.Y.Ji, J.F.Zhang and J.Y.Pak, Commun. Theor. Phys. 33

- (2000) 593 - [A38]
5. C.B.Moon, T.Komatsubara and K.Furuno, J. Korean Phys. Soc. 43 (2003) 574 - [A38]
  6. K.Singh, Z.Naik, R.Kumar, J.Goswamy, D.Mehta, N.Singh, C.R.Praharaj, E.S.Paul, K.P.Singh, R.P.Singh, S.Muralithar, N.Madhavan, J.J.Das, S.Nath, A.Jhingan, P.Sugathan and R.K.Bhowmik, Eur. Phys. J. A 25 (2005) 345 - [A38]
  7. G.Rainovski, D.L.Balabanski and V.I.Dimitrov, Phys. Rev. C 72 (2005) 029801 - [A38]
  8. S.Lalkovski and N.Minkov, J. Phys. G 31 (2005) 427 - [A38]
  9. R.Kumar, K.Singh, D.Mehta, N.Singh, S.S.Malik, E.S.Paul, A.Gorgen, S.Chmel, R.P.Singh and S.Muralithar, Eur. Phys. J. A 24 (2005) 13 - [A38]
  10. J.Katakura and Z.D.Wu, Nuclear Data Sheets 109 (2008) 1655 - [A38]
  11. B.Saha, Dissertation, Universität zu Köln (2004) - [A38]
  12. B.Mohammed-Azizi and D.E.Medjadi, Eur. Phys. J. A 48 (2013) 178 - [A38]
  13. N.Kaur, A.Kumar, G.Mukherjee, A.Singh, S.Kumar, R.Kaur, V.Singh, B.Behera, G.Singh, H.Sharma, S.Kumar, M.K.Raju, P.V.M.Rao, S.Muralithar, R.Singh, R.Kumar, N.Madhvan, R.Bhowmik, Eur. Phys. J. A 50 (2014) 5 - [A38]

#### A39) LIFETIME MEASUREMENTS FOR $^{134}\text{Nd}$ AND NEIGHBORING NUCLEI WITH THE COINCIDENCE-PLUNGER TECHNIQUE

T.Klemme, A.Fitzler, A.Dewald, S.Schell, S.Kasemann, R.Kühn, O.Stuch, H.Tiesler, K.O.Zell, P. von Brentano, D.Bazzacco, F.Brandolini, S.Lunardi, C.M.Petrache, C.Rossi-Alvarez, G. de Angelis, P.Petkov and R.Wyss

**Physical Review C60 (1999) 034301**

1. Y.Khazov, I.Mitropolsky and A.Rodionov, Nucl. Data Sheets 107 (2006) 2715 - [A39]
2. Y.Khazov, A.A.Rodionov, S.Sakharov and B.Singh, Nucl. Data Sheets 104 (2005) 497 - [A39]
3. A.A.Sonzogni, Nucl. Data Sheets 103 (2004) 1 - [A39]
4. E.O.Lieder, R.M.Lieder, A.A.Pasternak, B.G.Carlsson, I.Ragnarsson, R.A.Bark, E.Gueorguieva, J.J.Lawrie, S.M.Mullins, P.Papka, Y.Kheswa, J.F.Sharpey-Schafer, W.Gast and G.Duchenel, in: Frontiers in Nuclear Structure, Astrophysics, and Reactions - FINUSTAR 2, AIP Conference Proceedings 1012 (2008) 383, Editors: P.Demetriuo, S.V.Harissopoulos and R.Julin - [A39]
5. B.Singh, A.A.Rodionov and Y.L.Khazov, Nuclear Data Sheets 109 (2008) 517-698 - [A39]
6. R.Peusquens, Dissertation, Universität zu Köln (2000) - [A39]
7. Y.Khazov, A.Rodionov, F.G.Kondev, Nuclear Data Sheets 112 (2011) 855 - [A39]

8. K.Higashiyama and N.Yoshinaga, Phys. Rev. C 83 (2011) 034321 - [A39]
9. M.G.Procter, D.M.Cullen, C.Scholey, P.T.Greenlees, J.Hirvonen, U.Jakobsson, P.Jones, R.Julin, S.Juutinen, S.Ketelhut, M.Leino, N.M.Lumley, P.J.R.Mason, P.Nieminan, M.Nyman, P.Peura, P.Rahkila, J.M.Regis, P.Ruotsalainen, J.Saren, Y.Shi, J.Sorri, S.Stolze, J.Uusitalo, and F.R.Xu, Phys. Rev. C 83 (2011) 034311 - [A39]
10. B.Qi, J.Li, S.Y.Wang, J.Zhang, and S.Q.Zhang, Chinese Physics Letters 29 (2012) 072101 -[A39]

A40) ON THE LINE-SHAPE AND LIFETIME DETERMINATION IN RECOIL DISTANCE DOPPLER-SHIFT MEASUREMENTS

P.Petkov, D.Tonev, J.Gableske, A.Dewald, T.Klemme and P. von Brentano  
**Nuclear Instruments and Methods in Physics Research A431 (1999)**  
**208-223**

1. K.P.Lieb, E.Galindo-Leon and S.Dhar, Hyperfine Interactions 136 (2001) 215 - [A40]
2. K.P.Lieb, Prog. Part. Nucl. Phys. 46 (2001) 205 - [A40]
3. B.Saha, Dissertation, Universität zu Köln (2004) - [A40]
4. R.Peusquens, Dissertation, Universität zu Köln (2000) - [A40]
5. A.Fitzler, Dissertation, Universität zu Köln (2002) - [A40]
6. P.G.Bizzeti, J. Phys. Conf. Ser. 267 (2011) 012034 - [A40]
7. G.Rainovski, DSc Thesis, Sofia University 2012 - [A40]
8. M.Hackstein, Dissertation, Universität zu Köln (2013) - -[A40]
9. T.Pissulla, Dissertation, Universität zu Köln (2014) - -[A40]
10. P.G.Bizzeti, A.M.Bizzeti-Sona, Nucl. Instr. Meth. Phys. Res. A 736 (2014) 179 -[A116]

A41) LIFETIME ANALYSIS USING THE DOPPLER-SHIFT ATTENUATION METHOD WITH A GATE ON FEEDING TRANSITION

P.Petkov, D.Tonev, J.Gableske, A.Dewald and P. von Brentano  
**Nuclear Instruments and Methods in Physics Research A437 (1999)**  
**274-281**

1. K.P.Lieb, E.Galindo-Leon and S.Dhar, Hyperfine Interactions 136 (2001) 215 - [A41]
2. K.P.Lieb, Prog. Part. Nucl. Phys. 46 (2001) 205 - [A41]
3. E.Grodner, J.Srebrny, A.A.Pasternak, I.Zalewska, T.Morek, C.Droste, J.Mierzejewski, M.Kowalczyk, J.Kownacki, M.Kisielski, S.G.Rohozinski, T.Koike, K.Starosta, A.Kordyasz,

P.J.Napiorkowski, M.Wolinska-Cichocka, E.Ruchowska, W.Plociennik and J.Perkowski, Phys. Rev. Lett. 97 (2006) 172501 - [A41]

4. E.Grodner, A.A.Pasternak, C.Droste, T.Morek, J.Srebrny, J.Kownacki, W.Plociennik, A.A.Wasilewski, M.Kowalczyk, M.Kisielinski, R.Kaczarowski, E.Ruchowska, A.Kordyasz and M.Wolinska, Eur. Phys. J. A 27 (2006) 325 - [A41]

5. R.A.Kaye, C.J.Drover, S.L.Tabor, J.Doring, Y.C.Yang, Y.Sun, S.R.Arora, N.R.Baker, J.K.Bruckman, T.A.Hinners, C.R.Hoffman, and S.Lee, Phys. Rev. C 83 (2011) 044316 - [A41]

A42) HIGH-SPIN STRUCTURE OF THE NEUTRON-RICH  $^{107,109}_{45}\text{Rh}$  ISOTOPES:  
THE ROLE OF TRIAXIALITY

Ts.Venkova, M.-G.Porquet, I.Deloncle, B.J.P.Gall, H. De Witte, P.Petkov, A.Bauchet, T.Kutsarova, E.Gueorgieva, J.Duprat, C.Gautherin, F.Hoellinger, R.Lucas, A.Minkova, N.Schulz, H.Sergolle, E.A.Stefanova and A.Wilson

**European Physical Journal A6 (1999) 405-413**

1. E.W.Cybulski, J.R.B.Oliveira, M.A.Rizzutto, R.V.Ribas, N.H.Medina, W.A.Seale, M.N.Rao, F.R.Espinoza-Qui, J.A.Alcantara-Nunez and F.Falla-Sotelo, Acta Phys. Pol. B 32 (2001) 929 - [A42]

2. G.Simpson, J.Genevey, J.A.Pinston, U.Koster, R.Orlandi, A.Scherillo and I.A.Tsekhanovich, Phys. Rev. C 75 (2007) 027301 - [A42]

3. H.B.Ding, S.J.Zhu, J.H.Hamilton, A.V.Ramayya, J.K.Hwang, K.Li, Y.X.Luo, J.O.Rasmussen, I.Y.Lee, C.T.Goodin, X.L.Che, Y.J.Chen and M.L.Li Phys. Rev. C 74 (2006) 054301 - [A42]

4. H.B.Ding, S.J.Zhu, J.H.Hamilton, A.V.Ramayya, J.K.Hwang, Y.X.Luo, J.O.Rasmussen, I.Y.Lee, X.L.Che, Y.J.Chen and M.L.Li, Chinese Phys. Lett. 23 (2006) 3222 - [A42]

5. Y.X.Luo, J.H.Hamilton, J.O.Rasmussen, A.V.Ramayya, I.Stefanescu, J.K.Hwang, X.L.Che, S.J.Zhu, P.M.Gore, E.F.Jones, D.Fong, S.C.Wu, I.Y.Lee, T.N.Ginter, W.C.Ma, G.M.Ter-Akopian, A.V.Daniel, M.A.Stoyer, R.Donangelo and A.Gelberg, Phys. Rev. C 74 (2006) 024308 - [A42]

6. J.Blauchot, Nucl. Data Sheets 107 (2006) 355 - [A42]

7. Y.X.Luo, J.O.Rasmussen, I.Stefanescu, A.Gelberg, J.H.Hamilton, A.V.Ramayya, J.K.Hwang, S.J.Zhu, P.M.Gore, D.Fong, E.F.Jones, S.C.Wu, I.Y.Lee, T.N.Ginter, W.C.Ma, G.M.Ter-Akopian, A.V.Daniel, M.A.Stoyer and R.Donangelo, J. Phys. G 31 (2005) 1303 - [A42]

8. J.A.Alcantara-Nunez, J.R.B.Oliveira, E.W.Cybulski, N.H.Medina, M.N.Rao, R.V.Ribas, M.A.Rizzutto, W.A.Seale, F.Falla-Sotelo and K.T.Wiedemann, Phys. Rev. C 71 (2005) 054315 - [A42]

9. Y.X.Luo, J.O.Rasmussen, J.H.Hamilton, A.V.Ramayya, J.K.Hwang, S.J.Zhu, P.M.Gore, S.C.Wu, I.Y.Lee, P.Fallon, T.N.Ginter, G.M.Ter-Akopian, A.V.Daniel,

- M.A.Stoyer, R.Donangelo and A.Gelberg, Phys. Rev. C 70 (2004) 044310 - [A42]
10. W.Korten, Eur. Phys. J. A 20 (2004) 5 - [A42]
  11. Y.X.Luo, S.C.Wu, J.Gilat, J.O.Rasmussen, J.H.Hamilton, A.V.Ramayya, J.K.Hwang, C.J.Beyer, S.J.Zhu, J.Kormicki, X.Q.Zhang, E.F.Jones, P.A.Gore, I.Y.Lee, P.Zielinski, C.M.Folden, T.N.Ginter, P.Fallon, G.M.Ter-Akopian, A.V.Daniel, M.A.Stoyer, J.D.Cole, R.Donangelo, S.J.Asztalos and A.Gelberg, Phys. Rev. C 69 (2004) 024315 - [A42]
  12. J.R.B.Oliveira, E.W.Cybulski, N.H.Medina, M.N.Rao, R.V.Ribas, M.A.Rizzutto, W.A.Seale, F.Falla-Sotelo, K.T.Wiedemann, V.I.Dimitrov, S.Frauendorf and J.A.Alcantara-Nunez, Phys. Rev. C 69 (2004) 024317 - [A42]
  13. J.Balachot, Nuclear Data Sheets 109 (2008) 1383 - [A42]
  14. J.Kurpeta, W.Urban, C.Droste, A.Plochocki, S.G.Rohozinski, T.Rzaca-Urban, T.Morek, L.Prochniak, K.Starosta, J.Aysto, H.Penttila, J.L.Durell, A.G.Smith, G.Lhersonneau and I.Ahmad, Eur. Phys. J. A 33 (2007) 307 - [A42]
  15. J.Rissanen, J.Kurpeta, A.Plochocki, V.V.Elomaa, T.Eronen, J.Hakala, A.Jokinen, A.Kankainen, P.Karvonen, I.D.Moore, H.Penttila, S.Rahaman, A.Saastamoinen, W.Urban, C.Weber, and J.Aysto, Eur. Phys. J. A 47 (2011) 97 - [A42]
  16. S.H.Liu, J.H.Hamilton, A.V.Ramayya, A.Gelberg, L.Gu, E.Y.Yeoh, S.J.Zhu, N.T.Brewer, J.K.Hwang, Y.X.Luo, J.O.Rasmussen, W.C.Ma, A.V.Daniel, Y.T.Oganessian and G.M.Ter-Akopian, Phys. Rev. C 84 (2011) 014304 - [A42]
  17. C.Y.He, B.B.Yu, L.H.Zhu, X.G.Wu, Y.Zheng, B.Zhang, S.H.Yao, L.L.Wang, G.S.Li, X.Hao, Y.Shi, C.Xu, F.R.Xu, J.G.Wang, L.Gu, and M.Zhang, Phys. Rev. C 86 (2012) 047302 -[A42]
  18. Y.X.Luo, S.H.Liu, J.H.Hamilton, A.V.Ramayya, J.O.Rasmussen, J.K.Hwang, N.T.Brewer, and S.J.Zhu, Romanian Journal of Physics 57 (2012) 309 -[A42]
  19. S.H.Liu, J.H.Hamilton, A.V.Ramayya, S.J.Zhu, Y.Shi, F.R.Xu, J.C.Batchelder, N.T.Brewer, J.K.Hwang, Y.X.Luo, J.O.Rasmussen, W.C.Ma, A.V.Daniel, G.M.Ter-Akopian, and Y.T.Oganessian, Phys. Rev. C 87 (2013) 057302 -[A42]

#### A43) COINCIDENCE RECOIL-DISTANCE DOPPLER-SHIFT LIFETIME MEASUREMENTS IN $^{129,130}\text{Ba}$ WITH EUROBALL Ge CLUSTER DETECTORS

O.Stuch, K.Jessen, R.S.Chakrawarthy, A.Dewald, R.Kühn, R.Krücken, P.Petkov, R.Peusquens, H.Tiesler, D.Weil, I.Wiedenhöver, K.O.Zell, P. von Brentano, C.Ender, T.Härtlein, F.Köck, O.Koschorrek and P.Reiter

**Physical Review C61 (2000) 044325**

1. H.Sakamoto, Phys. Rev. C 64 (2001) 024303 - [A43]
2. E.Grodner, A.A.Pasternak, C.Droste, T.Morek, J.Srebrny, J.Kownacki, W.Plociennik, A.A.Wasilewski, M.Kowalczyk, M.Kisielinski, R.Kaczarowski, E.Ruchowska, A.Kordyasz and M.Wolinska, Eur. Phys. J. A 27 (2006) 325 - [A43]

3. C.Y.He, L.H.Zhu, X.G.Wu, S.X.Wen, G.S.Li, Y.Liu, Z.M.Wang, X.Q.Li, X.Z.Cui, R.G.Ma and C.X.Yang, in: Nuclear Physics and Astrophysics, AIP Conference Proceedings 1072 (2008) 302, Editors: I.Boztosun and A.B.Balantekin - [A43]
4. K.Higashiyama and N.Yoshinaga, Eur. Phys. J. A 33 (2007) 355 - [A43]
5. C.Y.He, L.H.Zhu, X.G.Wu, S.X.Wen, G.S.Li, Y.Liu, Z.M.Wang, X.Q.Li, X.Z.Cui, H.B.Sun, R.G.Ma, and C.X.Yang, Phys. Rev. C 81 (2010) 057301 - [A43]
6. C.Y.He, X.Q.Li, L.H.Zhu, X.G.Wu, Y.Liu, B.Pan, X.Hao, L.H.Li, Z.M.Wang, G.S.Li, Z.Y.Li, S.Y.Wang, Q.Xu, J.G.Wang, H.B.Ding and J.Zhai, Nucl. Phys. A 834 (2010) 84c - [A43]
7. K.Y.Ma, J.B.Lu, D.Yang, J.Li, H.D.Wang, Y.Z.Liu, X.G.Wu, L.H.Zhu, Y.Zheng, and C.Y.He, Chinese Physics Letters 29 (2012) 062102 -[A43]
8. T.Alharbi, P.H.Regan, P.J.R.Mason, N.Marginean, Z.Podolyak, A.M.Bruce, E.C.Simpson, A.Algora, N.Alazemi, R.Britton, M.R.Bunce, D.Bucurescu, N.Cooper, D.Deleanu, W.Gelletly, D.Ghita, T.Glodariu, G.Ilie, S.Kisyov, J.Lintott, S.Lalkovski, S.Liddick, C.Mihai, K.Mulholland, R.Marginean, A.Negret, M.Nakhostin, C.R.Nita, O.J.Roberts, S.Rice, J.F.Smith, L.Stroe, T.Sava, C.Townsley, E.Wilson, V.Werner, M.Zhekova, and N.V.Zamfir, Phys. Rev. C 87 (2013) 014323 - [A43]

A44) ON THE TWO-QUASINEUTRON ROTATIONAL BAND IN  $^{128}\text{Ba}$   
 P.Petkov, A.Dewald, R.Kühn, R.Peusquens, D.Tonev, S.Kasemann, K.O.Zell, P.von Brentano, D.Bazzacco, C.Rossi-Alvarez, G. de Angelis, S.Lunardi, P.Pavan and D.R.Napoli

**Nuclear Physics A674 (2000) 357-376**

A45) COINCIDENCE RECOIL-DISTANCE DOPPLER-SHIFT LIFETIME MEASUREMENTS IN  $^{128}\text{Ba}$

P.Petkov, A.Dewald, R.Kühn, R.Peusquens, D.Tonev, S.Kasemann, K.O.Zell, P.von Brentano, D.Bazzacco, C.Rossi-Alvarez, G. de Angelis, S.Lunardi, P.Pavan and D.R.Napoli

**Physical Review C62 (2000) 014314**

1. A.A.Pasternak, A.D.Efimov, E.O.Podsvoirova, V.M.Mikhajlov, J.Srebrny, T.Morek, C.Droste, Y.Sasaki, M.Oshima, S.Juutinen and G.B.Hagemann, Acta Phys. Pol. B 32 (2001) 2719 - [A45]
2. K.Kumar and J.B.Gupta, Nucl. Phys. A 694 (2001) 199 - [A45]
3. G.Rainovski, D.L.Balabanski and V.I.Dimitrov, Phys. Rev. C 72 (2005) 029801 - [A45]

4. I.Sankowska, C.Droste, E.Grodner, T.Morek, J.Srebrny, A.A.Pasternak, J.Kownacki, P.Napiorkowski, S.G.Rohozinski, M.Kowalczyk, M.Kisielinski, R.Kaczarowski and E.Ruchowska, Eur. Phys. J. A 37 (2008) 169 - [A45]
5. K.Higashiyama and N.Yoshinaga, Eur. Phys. J. A 33 (2007) 355 - [A45]
6. A.A.Pasternak, A.D.Efimov, E.O.Podsvirova, V.M.Mikhajlov, J.Srebrny, T.Morek, C.Droste, Y.Sasaki, M.Oshima, S.Juutinen and G.B. Hagemann, in: International Symposium on Nuclear Structure Physics - Celebrating the Career of Peter von Brentano, 2001, p.279, Editors: R.F.Casten, J.Jolie, U.Kneissl and K.P.Lieb - [A45]
7. B.Saha, Dissertation, Universität zu Köln (2004) - [A45]
8. C.Droste, S.G.Rohozinski, K.Starosta, L.Prochniak, and E.Grodner, Eur. Phys. J. A 42 (2009) 79 - [A45]
9. T.Alharbi, P.H.Regan, P.J.R.Mason, N.Marginean, Z.Podolyak, A.M.Bruce, E.C.Simpson, A.Algora, N.Alazemi, R.Britton, M.R.Bunce, D.Bucurescu, N.Cooper, D.Deleanu, W.Gelletly, D.Ghita, T.Glodariu, G.Ilie, S.Kisyov, J.Lintott, S.Lalkovski, S.Liddick, C.Mihai, K.Mulholland, R.Marginean, A.Negret, M.Nakhostin, C.R.Nita, O.J.Roberts, S.Rice, J.F.Smith, L.Stroe, T.Sava, C.Townsley, E.Wilson, V.Werner, M.Zhekova, and N.V.Zamfir, Phys. Rev. C 87 (2013) 014323 - [A45]

A46) NEW METHODS FOR LIFETIME ANALYSIS IN DOPPLER-SHIFT MEASUREMENTS

D.Tonev, P.Petkov, A.Dewald, J.Gableske and P. von Brentano  
**Balkan Physics Letters, Special Issue 2000, 283-292**

A47) GATING ON THE FEEDING OR ON THE DEPOPULATING TRANSITION IN COINCIDENCE RECOIL-DISTANCE DOPPLER-SHIFT LIFETIME MEASUREMENTS

P.Petkov, A.Dewald and P. von Brentano  
**Nuclear Instruments and Methods in Physics Research A457 (2001)**  
**527**

1. J.Ljungvall, G.Georgiev, S.Cabaret, N.Karkour, D.Linget, G.Sedes, R.Chevrier, I.Matea, M.Niikura, M.D.Salsac, and B.Sulignano, Nucl. Instr. Meth. Phys. Res. A 679 (2012) 61 -[A47]
2. M.Hackstein, Dissertation, Universität zu Köln (2013) - -[A47]
3. T.Pissulla, Dissertation, Universität zu Köln (2014) - -[A47]
4. J.L.Wang, X.G.Wu, C.Y.He, G.S.Li, Q.W.Fan, Y.H.Du, S.P.Hu, Y.Zheng, Y (Zheng Yun)[ 1 ] ; C.B.Li, H.W.Li, J.J.Liu, P.W.Luo, S.H.Yao, Chinese Physics C 38

(2014) 036201 - [A47]

A48) LOW-LYING BANDS WITH DIFFERENT QUADRUPOLE DEFORMATION IN  $^{133}\text{Nd}$

P.Petkov, A.Dewald, R.Peusquens, S.Kasemann, R.Krücken, K.O.Zell, P. von Brentano, S.Lunardi, D.Bazzacco, F.Brandolini, N.H.Medina, P.Pavan, C.M.Petrache, C.Rossi-Alvarez, G. de Angelis, M. de Poli and D.R.Napoli

**Physical Review C63 (2001) 014304**

A49) COLLECTIVITY OF THE INTRUDER BANDS IN  $^{114}\text{Sn}$

J.Gableske, A.Dewald, H.Tiesler, M.Wilhelm, T.Klemme, O.Vogel, I.Schneider, R.Peusquens, S.Kasemann, K.O.Zell, P.von Brentano, P.Petkov, D.Bazzacco, C.Rossi Alvarez, S.Lunardi, G.de Angelis, M.de Poli and C.Fahlander

**Nuclear Physics A691 (2001) 551-576**

1. S.Ganguly, P.Banerjee, I.Ray, R.Kshetri, R.Raut, S.Bhattacharya, M.Saha-Sarkar, A.Goswami, S.Mukhopadhyay, A.Mukherjee, G.Mukherjee and S.K.Basu, Nucl. Phys. A 789 (2007) 1 - [A49]
2. P.Guazzoni, L.Zetta, A.Covello, A.Gargano, G.Graw, R.Hertenberger, H.F.Wirth and A.Jaskola, Phys. Rev. C 69 (2004) 024619 - [A49]
3. H.Watanabe, G.J.Lane, G.D.Dracoulis, T.Kibedi, A.P.Byrne, P.Nieminen, R.O.Hughes, F.G.Kondev, M.P.Carpenter, R.V.F.Janssens, T.Lauritsen, D.Seweryniak, S.Zhu, P.Chowdhury and C.B.Moon, Phys. Rev. C 79 (2009) 024306 - [A49]
4. P.Doornenbal, P.Reiter, H.Grawe, H.J.Wollersheim, P.Bednarczyk, L.Caceres, J.Cederkall, A.Ekstrom, J.Gerl, M.Gorska, A.Jhingan, I.Kojouharov, R.Kumar, W.Prokopowicz, H.Schaffner and R.P.Singh, Phys. Rev. C 78 (2008) 031303 - [A49]
5. P.Klupfel, J.Erler, P.G.Reinhard and J.A.Maruhn, Eur. Phys. J. 37 (2008) 343 - [A49]
6. S.F.Ashley, P.H.Regan, K.Andgren, E.A.McCutchan, N.V.Zamfir, L.Amon, R.B.Cakirli, R.F.Casten, R.M.Clark, W.Gelletly, G.Gurdal, K.L.Keyes, D.A.Meyer, M.N.Erduran, A.Papenberg, N.Pietralla, C.Plettner, G.Rainovski, R.V.Ribas, N.J.Thomas, J.Vinson, D.D.Warner, V.Werner, E.Williams, H.L.Liu, and F.R.Xu, Phys. Rev. C 76 (2007) 064302 - [A49]
7. H.Watanabe, G.J.Lane, G.D.Dracoulis, A.P.Byrne, P.Nieminen, F.G.Kondev, K.Ogawa, M.P.Carpenter, R.V.F.Janssens, T.Lauritsen, D.Seweryniak, S.Zhu, and P.Chowdhury, Eur. Phys. J. A 42 (2009) 163 - [A49]
8. S.Y.Wang, B.T.Duan, X.X.Zhu, X.L.Ren, X.L.Yang, J.Xi, F.Z.Lu, D.P.Sun,

Y.B.Lu, X.J.Liu, H.Hua, Z.Y.Li, S.Q.Zhang, B.Qi, J.M.Yao, L.H.Zhu, X.G.Wu, G.S.Li, Y.Liu, X.Q.Li, Y.Zheng, L.L.Wang, and L.Wang, Chinese Physics C 33 (2009) 838 - [A49]

9. A.Jungclaus, J.Walker, J.Leske, K.H.Speidel, A.E.Stuchbery, M.East, P.Boutachkov, J.Cederkall, P.Doornenbal, J.L.Egido, A.Ekstrom, J.Gerl, R.Gernhauser, N.Goel, M.Gorska, I.Kojouharov, P.Maier-Komor, V.Modamio, F.Naqvi, N.Pietralla, S.Pietri, W.Prokopowicz, H.Schaffner, R.Schwengner, and H.J.Wollersheim, Phys. Lett. B 695 (2011) 110 - [A49]
10. J.Erler, P.Klupfel, and P.G.Reinhard, J. Phys. G 38 (2011) 033101 - [A49]
11. S.Y.Wang, D.P.Sun, B.T.Duan, X.L.Ren, B.Qi, X.X.Zhu, F.Z.Lv, C.Liu, C.J.Xu, J.Meng, H.Hua, F.R.Xu, Z.Y.Li, S.Q.Zhang, Y.Shi, J.M.Yao, L.H.Zhu, X.G.Wu, G.S.Li, Y.Liu, X.Q.Li, Y.Zheng, L.L.Wang, and L.Wang, Phys. Rev. C 81 (2010) 017301 - [A49]
12. K.Heyde and J.L.Wood, Rev. Mod. Phys. 83 (4) (2011) - [A49]
13. S.Ganguly, P.Banerjee, A.Dey and S.Bhattacharya Pramana-J.Phys. 77 (2011) 277 - [A49]
14. M.Hackstein, Dissertation, Universität zu Köln (2013) - -[A49]

A50) TRANSITION RATES AND NUCLEAR STRUCTURE CHANGES IN THE MIRROR NUCLEI  $^{47}\text{Cr}$  AND  $^{47}\text{V}$

D.Tonev, P.Petkov, A.Dewald, T.Klug, P. von Brentano, W.Andrejtscheff, S.M.Lenzi, D.R.Napoli, N.Marginean, F.Brandolini, C.A.Ur, M. Axiotis, P.G.Bizzeti and A.Bizzeti-Sona

**Physical Review C65 (2002) 034314**

1. T.W.Burrows, Nucl. Data Sheets 108 (2007) 923 - [A50]
2. J.Y.Zhu and F.R.Xu, High Energy Physics and Nuclear Physics -Chinese edition 30 Suppl. 2 (2006) 84 - [A50]
3. A.Juodagalvis, I.Ragnarsson and S.Aberg, Phys. Rev. C 73 (2006) 044327 - [A50]
4. E.Caurier, G.Martinez-Pinedo, F.Nowacki, A.Poves and A.P.Zuker, Rev. Mod. Phys. 77 (2005) 427 - [A50]
5. W.Korten, Eur. Phys. J. A 20 (2004) 5 - [A50]
6. C.Qi and F.R.Xu, Nucl. Phys. A 814 (2008) 48 - [A50]

A51) HIGH PRECISION QUADRUPOLE MOMENT MEASUREMENTS OF STATES UP TO  $I = 20$  IN THE YRAST BAND OF  $^{158}\text{Er}$

S.L.Shepherd, J.Simpson, A.Dewald, P.Petkov, P.J.Nolan, M.A.Riley, A.J.Boston, T.B.Brown, R.M.Clark, P.Fallon, D.J.Hartley, S.Kasemann, R.Krücken, P. von Brentano,

R.W.Laird, E.S.Paul and R.Peusquens  
**Physical Review C65 (2002) 034320**

1. R.G.Helmer, Nucl. Data Sheets 101 (2004) 325 - [A51]
2. X.Wang and M.A.Riley, AIP Conf. Proc. 1498 (2012) 84-96 -[A51]

A52) COHERENT PROTON-NEUTRON CONTRIBUTION TO OCTUPOLE CORRELATIONS IN THE NEUTRON-DEFFICIENT  $^{114}\text{Xe}$  NUCLEUS

G. de Angelis, A.Gadea, E.Farnea, R.Isocrate, P.Petkov, N.Marginean, D.R.Napoli, A.Dewald, M.Bellato, A.Bracco, F.Camera, D.Curien, M. De Poli, E.Fioretto, A.Fitzler, S.Kasemann, N.Kintz, T.Klug, S.Lenzi, S.Lunardi, R.Menegazzo, P.Pavan, J.L.Pedroza, V.Pucknell, C.Ring, J.Simpson and R.Wyss

**Physics Letters B 535 (2002) 93-102**

1. R.Kumar, A.Kumar, S.K.Chamoli, K.Singh, M.Sharma, D.Mehta, N.Singh, S.S.Ghugre, N.S.Pattabiraman, L.Chaturvedi, P.K.Joshi, H.C.Jain, Z.Naik, C.R.Praharaj and I.M.Govil, Phys. Rev. C 72 (2005) 044319 - [A52]
2. R.B.Cakirli, R.F.Casten, J.Jolie and N.Warr, Phys. Rev. C 70 (2004) 047302 - [A52]
3. M.Petri, E.S.Paul, B.Cederwall, I.G.Darby, M.R.Dimmock, S.Eeckhaudt, E.Ganioglu, T.Grahn, P.T.Greenlees, B.Hadinia, P.Jones, D.T.Joss, R.Julin, S.Juutinen , S.Ketelhut, A.Khulanov, M.Leino, L.Nelson, M.Nyman, R.D.Page, P.Rahkila, M.Sandzelius, J.Saren, C.Scholey, J.Sorri, J.Uusitalo and R.Wadsworth, Phys. Rev. C 76 (2007) 054301 - [A52]
4. E.S.Paul, A.J.Boston, C.J.Chiara, M.Devlin, D.B.Fossan, S.J.Freeman, D.R.LaFosse, G.J.Lane, M.J.Leddy, I.Y.Lee, A.O.Macchiavelli, P.J.Nolan, D.G.Sarantites, J.M.Sears, A.T.Semple, J.F.Smith, and K.Starosta, Phys. Rev. C 76 (2007) 034322 - [A52]
5. I.M.Govil, in: 12th International Symposium on Capture Gamma-Ray Spectroscopy and Related Topics, AIP Conference Proceedings 819 (2006) 454 - [A52]
6. S.Sihotra, Z.Naik, S.Kumar, K.Singh, J.Goswamy, N.Singh, R.Kumar, R.P.Singh, S.Muralithar, R.K.Bhowmik, R.Palit, and D.Mehta, Phys. Rev. C 83 (2011) 024313 - [A52]
7. H.L.Wang, H.L.Liu, F.R.Xu, and C.F.Jiao, Prog. Theor. Phys. 128 (2012) 363 -[A52]
8. B.Mohammed-Azizi and D.E.Medjadi, Eur. Phys. J. A 48 (2013) 178 - [A52]

A53) LIFETIME ANALYSIS USING THE DOPPLER-SHIFT ATTENUATION

METHOD WITH A GATE ON DEPOPULATING TRANSITION

P.Petkov, D.Tonev, A.Dewald and P. von Brentano

**Nuclear Instruments and Methods in Physics Research A488 (2002)  
555-561**

1. E.Grodner, A.A.Pasternak, C.Droste, T.Morek, J.Srebrny, J.Kownacki, W.Plociennik, A.A.Wasilewski, M.Kowalczyk, M.Kisielski, R.Kaczarowski, E.Ruchowska, A.Kordyasz and M.Wolinska, Eur. Phys. J. A 27 (2006) 325 - [A53]

2. R.A.Kaye, C.J.Drover, S.L.Tabor, J.Doring, Y.C.Yang, Y.Sun, S.R.Arora, N.R.Baker, J.K.Bruckman, T.A.Hinners, C.R.Hoffman, and S.Lee, Phys. Rev. C 83 (2011) 044316 - [A53]

A54) INVESTIGATION OF NUCLEAR STRUCTURES USING TRANSITION PROBABILITIES

A.Dewald, O.Möller, R.Peusquens, B.Saha, K.Jessen, A.Fitzler, T.Klug, D.Tonev, P. von Brentano, P.Petkov, I.Wiedenhöver, C.Carpenter, A.Heinz, R.V.Jansenns, Kh. Abu Saleem, B.J.P. Gall, J.R.Cooper, C.J.Barton, R.Krücken, A.M.Oros-Peusquens, U.Garg and S.Zhu

**BgNS Transactions 7, No.1 (2002) 81-88**

1. B.Saha, Dissertation, Universität zu Köln (2004) - [A54]

A55

A55) NEW DEVELOPMENTS IN THE ANALYSIS OF DOPPLER-SHIFT TIMING EXPERIMENTS USING REACTIONS INDUCED BY HEAVY IONS

P.Petkov, D.Tonev, A.Dewald, J.Gableske, T.Klemme, B.Saha and P. von Brentano

**BgNS Transactions 7, No.1 (2002) 89-93**

A56) HIGH-SPIN STRUCTURE OF THE NEUTRON-RICH ODD-ODD  $^{106,108}_{45}\text{Rh}$  AND  $^{110,112}_{47}\text{Ag}$  ISOTOPES

M.-G.Porquet, Ts.Venkova, P.Petkov, A.Bauchet, I.Deloncle, A.Astier, N.Buorn, J.Duprat, B.J.P.Gall, C.Gautherin, E.Gueorguieva, F.Hoellinger, T.Kutsarova, R.Lucas, M.Meyer, A.Minkova, N.Redon, N.Schulz, H.Sergolle and A.Wilson

**European Physical Journal A15 (2002) 463-470**

1. J.Peng, J.Meng, S.Q.Zhang, Chinese Phys. Lett. 20 (2003) 1223 - [A56]
2. N.Fotiades, J.A.Cizewski, R.Krucken, D.P.McNabb, J.A.Beauger, L.A.Bernstein, W.Younes, R.M.Clark, P.Fallon, I.Y.Lee, A.O.Macchiavelli, Physical Review C 67 (2003) 064304 - [A56]
3. C.Y.He, L.H.Zhu, X.G.Wu, Z.M.Wang, Y.Liu, H.B.Sun, S.X.Wen, G.S.Li and C.X.Yang, High Energy Physics and Nuclear Physics-Chinese Edition 30, Suppl. 2, (2006) 175 - [A56]
4. J.C.Batchelder, J.C.Bilheux, C.R.Bingham, H.K.Carter, D.Fong, P.E.Garrett, R.Grzywacz, J.H.Hamilton, D.J.Hartley, J.K.Hwang, W.Krolas, W.D.Kulp, Y.Larochelle, A.Piechaczek, A.V.Ramayya, K.P.Rykaczewski, E.H.Spejewski, D.W.Stracener, M.N.Tantawy, J.A.Winger, J.L.Wood and E.F.Zganjar, Phys. Rev. C 72 (2005) 044306 - [A56]
5. P.Joshi, D.G.Jenkins, P.M.Raddon, A.J.Simons, R.Wadsworth, A.R.Wilkinson, D.B.Fossan, T.Koike, K.Starosta, C.Vaman, J.Timar, Z.Dombradi, A.Krasznahorkay, J.Molnar, D.Sohler, L.Zolnai, A.Algora, E.S.Paul, G.Rainovski, A.Gizon, J.Gizon, P.Bednarczyk, D.Curien, G.Duchene and J.N.Scheurer, Phys. Lett. B 595 (2004) 135 - [A56]
6. X.Hao, L.H.Zhu, X.G.Wu, C.Y.He, G.S.Li, X.Q.Li, Y.Liu, L.H.Li and B.Pan, Chinese Physics C 32 (2008) 143 - [A56]
7. D. De Frenne and A.Negret, Nuclear Data Sheets 109 (2008) 943 - [A56]
8. G.Rainovski, DSc Thesis, Sofia University 2012 - [A56]
9. S.Roy, N.Rather, P.Datta, S.Chattopadhyay, R.A.Bark, S.Pal, S.Bhattacharya, R.K.Bhowmik, A.Goswami, H.C.Jaine, R.Kumar, E.Lawrie, S.Muralithar, D.Negi, R.Palit, and R.P.Singh, Phys. Lett. B 710 (2012) 587 -[A56]
10. S.H.Liu, J.H.Hamilton, A.V.Ramayya, S.J.Zhu, Y.Shi, F.R.Xu, J.C.Batchelder, N.T.Brewer, J.K.Hwang, Y.X.Luo, J.O.Rasmussen, W.C.Ma, A.V.Daniel, G.M.Ter-Akopian, and Y.T.Oganessian, Phys. Rev. C 87 (2013) 057302 -[A56]

**A57) LIFETIME DETERMINATION IN DELAYED-COINCIDENCE EXPERIMENTS USING THE DIFFERENTIAL DECAY-CURVE APPROACH**

P.Petkov, O.Möller, D.Tonev, A.Dewald and P. von Brentano  
**Nuclear Instruments and Methods in Physics Research A 500 (2003)**  
**379-385**

1. S.Kisyov, MSc Diploma Thesis, Sofia University 2012 - [A57]

**A58) ELECTROMAGNETIC B(E2) TRANSITION STRENGTHS ALONG THE**

## YRAST NEGATIVE-PARITY BAND OF $^{113}\text{I}$

P.Petkov, A.Dewald, A.Fitzler, T.Klug, G. de Angelis, E.Farnea, A.Gadea, R.Isocrate, N.Marginean, D.R.Napoli, D.Curien, N.Kintz, S.Lenzi, S.Lunardi, R.Menegazzo, V.Pucknell and C.Ring

**Physical Review C67 (2003) 054306**

1. J.Blauchot, Nucl. Data Sheets 104 (2005) 791 - [A58]
2. J.Blauchot, Nuclear Data Sheets 111 (2010) 1471 - [A58]

## A59) COLLECTIVITY AT HIGH SPINS IN $^{156}\text{Dy}$

P.Petkov, A.Dewald, O.Möller, B.Saha, A.Fitzler, K.Jessen, D.Tonev, T.Klug, S.Heinze, J.Jolie, P. von Brentano, D.Bazzacco, C.Ur, E.Farnea, M.Axiotis, S.Lunardi, C.Rossi-Alvarez, G. de Angelis, D.R. Napoli, N. Marginean, T. Martinez, M.Caprio and R.F.Casten

**Physical Review C68 (2003) 034328**

1. D.A.Torres, F.Cristancho, L.L.Andersson, E.K.Johansson, D.Rudolph, C.Fahlander, J.Ekman, R. du Rietz, C.Andreoiu, M.P.Carpenter, D.Seweryniak, S.Zhu, R.J.Charity, C.J.Chiara, C.Hoel, O.L.Pechenaya, W.Reviol, D.G.Sarantites, L.G.Sobotka, C.Baktash, C.H.Yu, B.G.Carlsson and I.Ragnarsson, Phys. Rev. C 78 (2008) 054318 - [A59]

2. P.G.Bizzeti, in: 5th Italy/Japan Symposium on Recent Achievements and Perspectives in Nuclear Physics, Nov 03-07, 2004 Naples, Italy, Recent Achievements and Perspectives in Nuclear Physics (2005) 35 - [A59]

3. C.W.Reich, Nuclear Data Sheets 113 (2012) 2537 -[A59]

## A60) RECOIL-GATED PLUNGER LIFETIME MEASUREMENTS IN $^{188}\text{Pb}$

A.Dewald, R.Peusquens, B.Saha, P. von Brentano, A.Fitzler, T.Klug, I.Wiedenhöver, M.P.Carpenter, A.Heinz, R.V.F.Janssens, F.G. Kondev, C.J. Lister, D. Seweryniak, K. Abu Saleem, R. Krücken, J.R.Cooper, C.J.Barton, K.Zyromski, C.W.Beausang, Z.Wang, P.Petkov, A.M.Oros-Peusquens, U.Garg and S.Zhu

**Physical Review C68 (2003) 034314**

1. S.Ganguly, P.Banerjee, I.Ray, R.Kshetri, R.Raut, S.Bhattacharya, M.Saha-Sarkar, A.Goswami, S.Mukhopadhyay, A.Mukherjee, G.Mukherjee and S.K.Basu, Nucl. Phys. A 789 (2007) 1 - [A60]
2. C.Xu and Z.Z.Ren, Phys. Rev. C 75 (2007) 044301 - [A60]
3. J.Pakarinen, I.G.Darby, S.Eeckhaudt, T.Enqvist, T.Grahn, P.T.Greenlees,

- V.Hellemans, K.Heyde, F.Johnston-Theasby, P.Jones, R.Julin, S.Juutinen, H.Kettunen, M.Leino, A.P.Leppanen, P.Nieminen, M.Nyman, R.D.Page, P.M.Raddon, P.Rahkila, C.Scholey, J.Uusitalo and R.Wadsworth, Phys. Rev. C 72 (2005) 011304 - [A60]
4. M.Leino, Nucl. Phys. A 751 (2005) 248C - [A60]
  5. V.Hellemans, R.Fission, S. De Baerdemacker and K.Heyde, Phys. Rev. C 71 (2005) 034308 - [A60]
  6. M.Leino and F.P.Hessberger, Ann. Rev. Nucl. Part. Sciene 54 (2004) 175 - [A60]
  7. K.Heyde, J.Jolie, R.Fission, S. De Baerdemacker and V.Hellemans, Phys. Rev. C 69 (2004) 054304 - [A60]
  8. G.D.Dracoulis, G.J.Lane, A.P.Byrne, T.Kibedi, A.M.Baxter, A.O.Macchiavelli, P.Fallon and R.M.Clark, Phys. Rev. C 69 (2004) 054318 - [A60]
  9. R.R.Rodriguez-Guzman, J.L.Egido and L.M.Robledo, Phys. Rev. C 69 (2004) 054319 - [A60]
  10. M.Bender, P.Bonche, T.Duguet and P.H.Heenen, Phys. Rev. C 69 (2004) 064303 - [A60]
  11. P.H.Heenen, M.Bender, P.Bonche and T.Duguet, Int. J. Mod. Phys. E 13 (2004) 133 - [A60]
  12. V.Hellemans, S. De Baerdemacker and K.Heyde, Phys. Rev. C 77 (2008) 064324 - [A60]
  13. M.Ionescu-Bujor, A.Iordachescu, C.A.Ur, N.Marginean, G.Suliman, D.Bucuresco, F.Brandolini, F. Della Vedova, S.Chmel, S.M.Lenzi, R.Marginean, N.H.Medina, D.R.Napoli, P.Pavan and R.V.Ribas, Phys. Rev. C 81 (2010) 024323 - [A60]
  14. J.E.Garcia-Ramos and K.Heyde, Nucl. Phys. A 825 (2009) 39 - [A60]
  15. A.Gorgen, J. Phys. G 37 (2010) 103101 - [A60]
  16. P.Rahkila, D.G.Jenkins, J.Pakarinen, C.Gray-Jones, P.T.Greenlees, U.Jakobsson, P.Jones, R.Julin, S.Juutinen, S.Ketelhut, H.Koivisto, M.Leino, P.Nieminen, M.Nyman, P.Papadakis, S.Paschalidis, M.Petri, P.Peura, O.J.Roberts, T.Ropponen, P.Ruotsalainen, J.Saren, C.Scholey, J.Sorri, A.G.Tuff, J.Uusitalo, R.Wadsworth, M.Bender and P.H.Heenen, Phys. Rev. C 82 (2010) 011303 - [A60]
  17. K.Heyde and J.L.Wood, Rev. Mod. Phys. 83 (4) (2011) - [A60]
  18. M.Hackstein, Dissertation, Universität zu Köln (2013) - -[A60]
  19. J.M.Yao, M.Bender, and P.-H.Heenen, Phys. Rev. C 87 (2013) 034322 -[A60]
  20. A.Goasduff, J.J.Valiente-Dobon, S.Lunardi, F.Haas, A.Gadea, G. de Angelis, D.Bazzacco, S.Courtin, E.Farnea, A.Gottardo, C.Michelagnoli, D.Mengoni, D.R.Napoli, F.Recchia, E.Sahin, C.A.Ur, Nucl. Instr. Meth. Phys. Res. A 758 (2014) 1 -[A60]
  21. C.Plaisir, L.Gaudefroy, V.Meot, A.Blanc, J.M.Daugas, O.Roig, N.Arnal, T.Bonnet, F.Gobet, F.Hannachi, M.Tarisien, M.Versteegen, T.Roger, M.Rejmund, A.Navin, C.Schmitt, G.Fremont, J.Goupil, J.Pancin, C.Spitaels, M.Zielinska, Phys. Rev. C 89 (2014) 021302 -[A60]
  22. J.E.Garcia-Ramos, K.Heyde, Phys. Rev. C 89 (2014) 014306 -[A60]

A61) TRANSITION PROBABILITIES IN  $^{154}\text{Gd}$ : EVIDENCE FOR X(5) CRITICAL POINT SYMMETRY

D.Tonev, A.Dewald, T.Klug, P.Petkov, J.Jolie, A.Fitzler, O. Möller, S.Heinze, P. von Brentano and R.F.Casten

**Physical Review C69 (2004) 034334**

1. J.F.Zhang, L.J.Lu and H.B.Bai, Chinese Phys. 16 (2007) 1941 - [A61]
2. C.E.Alonso, J.M.Arias and A.Vitturi, Phys. Rev. C75 (2007) 064316 - [A61]
3. L.Prochniak, Acta Phys. Pol. B 38 (2007) 1605 - [A61]
4. E.A.McCutchan, Revista Mexicana de Fisica 52 Suppl. S (2006) 62 - [A61]
5. V.Werner, E.Williams, P. von Brentano and C.Scholl, Revista Mexicana de Fisica 52 Suppl. S (2006) 103 - [A61]
6. Y.X.Liu, L.Z.Mu, L.Chang and W.Yuan, High Energy Physics and Nuclear Physics-Chinese Edition 30, Suppl.2 (2006) 29 - [A61]
7. L.J.Lu, J.F.Zhang and H.B.Bai, High Energy Physics and Nuclear Physics-Chinese Edition 30, Suppl.2 (2006) 62 - [A61]
8. Y.Zhang, Z.F.Hou and Y.X.Liu, High Energy Physics and Nuclear Physics-Chinese Edition 30, Suppl.2 (2006) 90 - [A61]
9. H.Hua, S.Wamg, J.Meng, Z.H.Li, S.Q.Zhang, F.R.Xu, H.L.Liu, S.G.Zhou, Y.L.Ye, D.X.Jiang, T.Zheng, L.H.Mu, X.G.Wu, G.S.Li, Q.J.Wang, Z.Q.Chen, C.E.Wu, G.L.Zhang, D.Y.Pang, J.Wang, J.L.Lou, B.Guo, G.Jin, S.X.Wen, C.Y.He, X.Z.Chui and Y.Liu, High Energy Physics and Nuclear Physics-Chinese Edition 30, Suppl.2 (2006) 157 - [A61]
10. L.Fortunato, S. De Baerdemacker and K.Heyde, Phys. Rev. C 74 (2006) 014310 - [A61]
11. M.Yu, P.F.Zhang, T.N.Ruan and J.Y.Guo, Int. J. Mod. Phys. E 15 (2006) 939 - [A61]
12. R.Fission, D.Bonatsos and G.A.Lalazissis, Phys. Rev. C 73 (2006) 044310 - [A61]
13. A.Dua, A.Bharti and S.K.Khosa, Indian Journal of Physics and Proceedings of the Indian Association for the Cultivation of Science 80 (2006) 275 - [A61]
14. K.Dusling, N.Pietralla, G.Rainovski, T.Ahn, B.Bochev, A.Costin, T.Koike, T.C.Li, A.Linnemann, S.Pontillo and C.Vaman, Phys. Rev. C 73 (2006) 014317 - [A61]
15. M.Caprio, Phys. Rev. C 72 (2005) 054323 - [A61]
16. Z.Q.Sheng and J.Y.Guo, Mod. Phys. Lett. A 20 (2005) 2711 - [A61]
17. A.Levitan, Phys. Rev. C 72 (2005) 031305 - [A61]
18. J.Meng, W.Zhang, S.G.Zhou, H.Toki and L.S.Geng, Eur. Phys. J. A 25 (2005) 23 - [A61]
19. K.Duisling and N.Pietralla, Phys. Rev. C 72 (2005) 011303 - [A61]

20. V.Werner, C.Scholl and P. von Brentano, Phys. Rev. C 71 (2005) 054314 - [A61]
21. F.Iachello, Nucl. Phys. A 751 (2005) 329c - [A61]
22. P.G.Bizzeti and A.M.Bizzeti-Sona, Phys. Rev. C 70 (2004) 064319 - [A61]
23. X.Hao, L.H.Zhu, X.G.Wu, G.S.Li, B.Pan, L.L.Wang, Y.Zheng, L.Wang, X.Q.Li, Y.Liu, H.B.Ding and Z.Y.Li, Chinese Physics C 33 Suppl. 1 (2009) 151 - [A61]
24. L.L.Wang, X.G.Wu, L.H.Zhu, G.S.Li, X.Hao, Y.Zheng, C.Y.He ,L.Wang, X.Q.Li, Y.Liu, B.Pan, Z.Y.Li, and H.B.Ding Chinese Physics C 33 Suppl. 1 (2009) 173 - [A61]
25. T.R.Rodriguez and J.L.Egido, in: 13th International Symposium on Capture Gamma-Ray Spectroscopy and Related Topics, AUG 25-29, 2008 Cologne, Germany, AIP Conference Proceedings 1090 (2009) 419 - [A61]
26. N.V.Zamfir, S.Anghel and G.Cata-Danila, in: Conference on Nuclear Physics and Astrophysics - From Stable Beams to Exotic Nuclei, JUN 25-30, 2008 Cappadocia, Turkey, AIP Conference Proceedings 1072 (2008) 118 - [A61]
27. L.M.Robledo, R.R.Rodriguez-Guzman and P.Sarriguren, Phys. Rev. C 78 (2008) 034314 - [A61]
28. Y.Zhang, Z.F.Hou, H.Chen, H.Q.Wei and Y.X.Liu, Phys. Rev. C 78 (2008) 024314 - [A61]
29. E.Williams, R.J.Casperson and V.Werner, Phys. Rev. C 77 (2008) 061302 - [A61]
30. J.F.Sharpey-Schafer, S.M.Mullins, R.A.Bark, E.Gueorguieva, J.Kau, F.Komati, J.J.Lawrie, P.Main, A.Minkova, S.H.T.Murray, N.J.Ncapayi and P.Vymers, in: FRON-TIERS IN NUCLEAR STRUCTURE, ASTROPHYSICS, AND REACTIONS - FI-NUSTAR 2, AIP Conference Proceedings 1012 (2008) 19 - [A61]
31. I.Boztosun, D.Bonatsos and I.Inci, Phys. Rev. C 77 (2008) 044302 - [A61]
32. D.Bonatsos, D.Lenis and D.Petrellis, Romanian Reports in Physics 59 (2007) 273 - [A61]
33. P.G.Bizzeti, A.M.Bizzeti-Sona, Phys. Rev. C 77 (2008) 024320 - [A61]
34. R.Rodriguez-Guzman and P.Sarriguren, Phys. Rev. C 76 (2007) 064303 - [A61]
35. D.Bonatsos, D.Lenis, D.Petrellis and I.Yigitoglu, Physics of Atomic Nuclei 70 (2007) 1582 - [A61]
36. E.Williams, R.J.Casperson and V.Werner, Phys. Rev. C 81 (2010) 054306 - [A61]
37. P.G.Bizzeti and A.M. Bizzeti-Sona, Phys. Rev. C 81 (2010) 034320 - [A61]
38. L.Bettermann, V.Werner, E.Williams and R.J.Casperson, Phys. Rev. C 81 (2010) 021303 - [A61]
39. R.A.Bark, J.F.Sharpey-Schafer, S.M.Maliage, T.E.Madiba, F.S.Komati, E.A.Lawrie, J.J.Lawrie, R.Lindsay, P.Main, S.M.Mullins, S.H.T.Murray, N.J.Ncapayi, T.M.Ramashidza, F.D.Smit and P.Vymers, Phys. Rev. Lett. 104 (2010) 022501 - [A61]

40. C.W.Reich, Nuclear Data Sheets 110 (2009) 2257 - [A61]
41. Z.F.Hou, Y.Zhang and Y.X.Liu, Phys. Rev. C 80 (2009) 054308 - [A61]
42. Y.Zhang, Z.F.Hou and Y.X.Liu, Science in China Series G-Physics Mechanics and Astronomy 52 (2009) 1579 - [A61]
43. A.I.Georgieva, H.G.Ganev, J.P.Draayer, and V.P.Garistov, Physics of Particles and Nuclei 40 (2009) 461 - [A61]
44. S.Anghel, G.Cata-Danil and N.V.Zamfir, Romanian Journal of Physics 54 (2009) 301 - [A61]
45. Z.P.Li, T.Niksic, D.Vretenar, J.Meng, G.A.Lalazissis and P.Ring, Phys. Rev. C 79 (2009) 054301 - [A61]
46. T.R.Rodriguez and J.L.Egido, AIP Conference Proceedings 1090 (2009) 419 - [A61]
47. L.R.Dai, W.X.Teng, F.Pan, and S.H.Wang, Chinese Phys. Lett. 28 (2011) 052101 - [A61]
48. A.I.Georgieva, H.G.Ganev, J.P.Draayer, and V.P.Garistov, J. Phys. Conf. Series 128 (2008) - [A61]
49. J.F.Sharpey-Schafer, S.M.Mullins, R.A.Bark, J.Kau, F.Komati, E.A.Lawrie, J.J.Lawrie, T.E.Madiba, P.Main, A.Minkova, S.H.T.Murray, N.J.Ncapayi, and P.A.Vymers, Eur. Phys. J. A 47 (2011) Art. No. 5 - [A61]
50. X.Hao, L.H.Zhu, X.G.Wu, C.Y.He, B.Pan, Y.Zheng, L.L.Wang, L.Wang, X.Q.Li, Y.Liu, H.B.Ding, Z.Y.Li, J.F.Zhang, H.B.Sun, and G.S.Li, J. Phys. G 38 (2011) 025102 - [A61]
51. E.Williams, R.J.Casperson and V.Werner, Phys. Rev. C 82 (2010) 054308 - [A61]
52. L.H.Zhu, X.G.Wu, C.Y.He, X.Hao, L.L.Wang, Y.Zheng, and G.S.Li, AIP Conf. Proc. 1235 (2010) 363 - [A61]
53. Y.Zhang, F.Pan, Y.X.Liu, Z.F.Hou, and J.P.Draayer, Phys. Rev. C 82 (2010) 034327 - [A61]
54. K.Heyde and J.L.Wood, Rev. Mod. Phys. 83 (4) (2011) - [A61]
55. X.Hao, L.H.Zhu, X.G.Wu, C.Y.He, Y.Zheng, L.H.Li, H.B.Sun, and G.S.Li, Chinese Phys. Lett. 28 (2011) 112101 -[A61]
56. Y.Zhang, F.Pan, Y.X.Liu, Y.A.Luo, and J.P.Draayer, Phys. Rev. C 84 (2011) 034306 -[A61]
57. A.Giannatiempo, Phys. Rev. C 84 (2011) 024308 -[A61]
58. A.Giannatiempo, L.Fortunato, and A.Vitturi, Phys. Rev. C 86 (2012) 034311 -[A61]
59. X.G.Wu, L.L.Wang, L.H.Zhu, G.S.Li, X.Hao, Y.Zheng, C.Y.He, X.Q.Li, B.Pan, Y.Liu, L.Wang, Y.X.Zhao, Z.Y.Li, and H.B.Ding, Plasma Science and Technology 14, (2012) Issue: 6 -[A61]
60. J.Kotila, K.Nomura, L.Guo, N.Shimizu, and T.Otsuka, Phys. Rev. C 85 (2012) 054309 -[A61]

61. G.Wang Gang, X.-Z.Fang and J.-Y.Guo, Acta Physica Sinica 61 (2012) 102101 -[A61]
62. A. Chakraborty, F.M. Prados-Estevez, S.N. Choudry, B.P. Crider, P.E. Garrett, W.D. Kulp, A. Kumar, M.T. McEllistrem, S. Mukhopadhyay, M.G. Mynk, J.N. Orce, E.E. Peters, J.L. Wood, and S.W. Yates, Phys. Rev. C 86 (2012) 064314 -[A61]
63. J.B.Gupta, Eur. Phys. J. 49 Issue: 10 DOI: 10.1140/epja/i2013-13126-4 -[A61]
64. N.Biasi, L.Guerro, A.Saltarelli, O.Wieland, and L.Fortunato, Phys. Rev. C 88 (2013) 014318 -[A61]
65. T.Pissulla, Dissertation, Universität zu Köln (2014) - -[A61]
66. C.Y.He, X.G.Wu, Y.Zheng, C.B.Li, X.Fang, Chinese Physics C 38 (2014) 024101 -[A61]
67. A.Raduta, P.Buganu, Phys. Rev. C 88 (2013) 064328 -[A61]

A62) SHAPE CHANGES AND TEST OF THE CRITICAL-POINT SYMMETRY X(5) IN N=90 NUCLEI

A.Dewald, O.Möller, D.Tonev, A.Fitzler, B.Saha, K.Jessen, S.Heinze, A.Linnemann, J.Jolie, K.O.Zell, P. von Brentano, P.Petkov, R.F.Casten, M.Caprio, J.R.Cooper, R.Krücken, V.Zamfir, D.Bazzacco, S.Lunardi, C.Rossi Alvarez, F.Brandolini, C.Ur, G. De Angelis, D.R.Napoli, E.Farnea, N.Marginean, T.Martinez and M.Axiotis

**European Physical Journal A20 (2004) 173-178**

1. H.Hua, S.Wamg, J.Meng, Z.H.Li, S.Q.Zhang, F.R.Xu, H.L.Liu, S.G.Zhou, Y.L.Ye, D.X.Jiang, T.Zheng, L.H.Mu, X.G.Wu, G.S.Li, Q.J.Wang, Z.Q.Chen, C.E.Wu, G.L.Zhang, D.Y.Pang, J.Wang, J.L.Lou, B.Guo, G.Jin, S.X.Wen, C.Y.He, X.Z.Chui and Y.Liu, High Energy Physics and Nuclear Physics-Chinese Edition 30, Suppl.2 (2006) 157 - [A62]
2. R.Fission, D.Bonatsos and G.A.Lalazissis, Phys. Rev. C 73 (2006) 044310 - [A62]
3. N.Minkov, P.Yotov, S.Drenska, W.Scheid, D.Bonatsos, D.Lenis and D.Petrellis, Phys. Rev. C 73 (2006) 044315 - [A62]
4. D.Bonatsos, D.Lenis, D.Petrellis, P.A.Terziev and I.Yigitoglu, Phys. Lett. B 632 (2006) 238 - [A62]
5. J.Billowes, Nucl. Phys. A 752 (2005) 309c - [A62]
6. L.M.Robledo, R.R.Rodriguez-Guzman and P.Sarriguren, Phys. Rev. C 78 (2008) 034314 - [A62]
7. Y.Zhang, Z.F.Hou, H.Chen, H.Q.Wei and Y.X.Liu, Phys. Rev. C 78 (2008) 024314 - [A62]
8. D.Bonatsos, D.Lenis and D.Petrellis, Romanian Reports in Physics 59 (2007) 273 - [A62]

9. R.Rodriguez-Guzman and P.Sarriguren, Phys. Rev. C 76 (2007) 064303 - [A62]
10. D.Bonatsos, D.Lenis, D.Petrellis and I.Yigitoglu, Physics of Atomic Nuclei 70 (2007) 1582 - [A62]
11. Z.F.Hou, Y.Zhang and Y.X.Liu, Phys. Rev. C 80 (2009) 054308 - [A62]
12. Y.Zhang, Z.F.Hou and Y.X.Liu, Science in China Series G-Physics Mechanics and Astronomy 52 (2009) 1579 - [A62]
13. L.R.Dai, W.X.Teng, F.Pan, and S.H.Wang, Chinese Phys. Lett. 28 (2011) 052101 - [A62]
14. C.W.Reich, Nuclear Data Sheets 113 (2012) 2537 -[A62]
15. A.Giannatiempo, L.Fortunato, and A.Vitturi, Phys. Rev. C 86 (2012) 034311 -[A62]
16. J.Kotila, K.Nomura, L.Guo, N.Shimizu, and T.Otsuka, Phys. Rev. C 85 (2012) 054309 -[A62]

A63) TEST OF ISOSPIN PURITY IN THE  $A = 42$  ISOBARIC ANALOGS  
 J.N.Orce, P.Petkov, C.J.McKay, S.N.Choudry, S.R.Lesher, M.Mynk, D.Bandyopadhyay,  
 S.W.Yates, and M.T.McEllistrem

**Physical Review C70 (2004) 014314**

1. F.M.P.Estevez, A.M.Bruce, M.J.Taylor, H.Amro, C.W.Beausang, R.F.Casten,  
 J.J.Ressler, C.J.Barton, C.Chandler and G.Hammond, Phys. Rev. C 75 (2007)  
 014309 -[A63]
2. G.Gaigalas, S.Fritzsche, E.Gaidamauskas, G.Kirsanskas and T.Zalandauskas,  
 Computer Physics Communications 175 (2006) 52 -[A63]

A64) A NEW METHOD FOR ANALYZING DELAYED COINCIDENCE DATA  
 P.Petkov, O.Möller, D.Tonev, A.Dewald, and P. von Brentano  
**BgNS Transactions 9, No.1 (2004) 207-213**

- A65) PROBING NUCLEAR STRUCTURE OF  $^{124}\text{Xe}$   
 B.Saha, A.Dewald, O.Möller, R.Peusquens, K.Jessen, A.Fitzler, T.Klug, D.Tonev,  
 P. von Brentano, B.J.P.Gall and P.Petkov  
**Physical Review C70 (2004) 034313**

1. W.F.Mueller, M.P.Carpenter, J.A.Church, D.C.Dinca, A.Gade, T.Glasmacher, D.T.Henderson, Z.Hu, R.V.F.Janssens, A.F.Lisetskiy, C.J.Lister, E.F.Moore, T.O.Pennington, B.C.Perry, I.Wiedenhover, K.L.Yurkewicz, V.G.Zelevinsky and H.Zwahlen, Phys. Rev. C 73 (2006) 014316 - [A65]
2. G.Rainovski, D.L.Balabanski and V.I.Dimitrov, Phys. Rev. C 72 (2005) 029801 - [A65]
3. A.Al-Khatib, H.Huebel, P.Bringel, C.Engelhardt, A.Neusser-Neffgen, G.B.Hagemann, C.R.Hansen, B.Herskind, G.Sletten, A.Bracco, F.Camera, G.Benzoni, P.Fallon, R.M.Clark, M.P.Carpenter, R.V.F.Janssens, T.L.Khoo, T.Lauritsen, P.Chowdhury, H.Amro, A.K.Singh and R.Bengtsson, Eur. Phys. J. A 36 (2008) 21 - [A65]
4. N.Turkan, J. Phys. G 34 (2007) 2235 - [A65]
5. J.Katakura and Z.D.Wu, Nuclear Data Sheets 109 (2008) 1655 - [A65]
6. N.Turkan, Physics of Atomic Nuclei 73 (2010) 64 - [A65]
7. I.Maras, R.Gumus and N.Turkan, Mathematical and Computational Applications 15 (2010) 79 - [A65]
8. G.Rainovski, DSc Thesis, Sofia University 2012 - [A65]
9. M.A.Jafarizadeh, N.Fouladi, and H.Sabri, Brazilian Journal of Physics 43 (2013) 34-40 - [A65]
10. B.Mohammed-Azizi and D.E.Medjadi, Eur. Phys. J. A 48 (2013) 178 - [A65]
11. J.B.Gupta, Nucl. Phys. A 927 (2014) 53 - [A65]

A66) LIFETIMES OF THE FIRST EXCITED  $2^+$  STATES IN  $^{176,178,180}\text{Os}$   
 O.Möller, P.Petkov, B.Melon, A.Dewald, A.Fitzler, J.Jolie, D.Tonev, S.Christen, B.Saha, K.O.Zell and M.Heidemann

**Physical Review C72 (2005) 034306**

1. X.Hao, L.H.Zhu, X.G.Wu, G.S.Li, B.Pan, L.L.Wang, Y.Zheng, L.Wang, X.Q.Li, Y.Liu, H.B.Ding and Z.Y.Li, Chinese Physics C 33 Suppl. 1 (2009) 151 - [A66]
2. R.Kumar, I.M.Govil, A.Dhal, L.Chaturvedi, C.R.Praharaj, A.K.Rath, G.K.Kumar, S.K.Basu, A.Chakraborty, Krishichayan, S.Mukhopadhyay, N.S.Pattabiraman, S.S.Ghugre, and A.K.Sinha, Phys. Rev. C 80 (2009) 054319 - [A66]
3. E.Achterberg, O.A.Capurro and G.V.Marti, Nuclear Data Sheets 110 (2009) 1473 - [A66]
4. X.Hao, L.H.Zhu, X.G.Wu, C.Y.He, Y.Zheng, L.H.Li, H.B.Sun, and G.S.Li, Chinese Phys. Lett. 28 (2011) 112101 -[A66]
5. X.Hao, L.H.Zhu, X.G.Wu, C.Y.He, B.Pan, Y.Zheng, L.L.Wang, L.Wang, X.Q.Li, Y.Liu, H.B.Ding, Z.Y.Li, J.F.Zhang, H.B.Sun, and G.S.Li, J. Phys. G 38 (2011) 025102 - [A66]
6. L.H.Zhu, X.G.Wu, C.Y.He, X.Hao, L.L.Wang, Y.Zheng, and G.S.Li, AIP Conf. Proc. 1235 (2010) 363 - [A66]

7. X.Hao, L.H.Zhu, X.G.Wu, C.Y.He, Y.Zheng, L.H.Li, H.B.Sun, and G.S.Li, Chinese Phys. Lett. 28 (2011) 112101 -[A66]
8. C.B.Li, X.G.Wu, X.F.Li, C.Y.He, Y.Zheng, G.S.Li, S.H.Yao, H.P.Hu, H.W.Li, J.L.Wang, J.J.Liu, C.Xu, J.J.Sun, and W.W.Qu, Phys. Rev. C 86 (2012) 057303 -[A66]
9. T.Pissulla, Dissertation, Universität zu Köln (2014) - -[A66]

A67) TRANSITION PROBABILITIES AND CHIRAL SYMMETRY IN  $^{134}\text{Pr}$   
 D.Tonev, G. de Angelis, P.Petkov, A.Dewald, A.Gadea, P.Pejovic, D.Balabanski, P.Bednarczyk, F.Camera, A.Fitzler, M.Axiotis, D.Bazzacco, E.Farnea, S.Lenzi, S.Lunardi, N.Marginean, T.Martines, R.Menegazzo, O.Möller, D.R.Napoli, A.Paleni, C.Petrache, G.Prete, B.R.Behera, C.Rusu, C.Ur, K.O.Zell and Y.H.Zhang  
 in *Nuclei at the Limits*, Eds. D.Seweryniak and T.L.Khoo, (American Institute of Physics Conf. Proc. 764, 2005) pp.93-98

1. K.Starosta, AIP Conf. Proc. 764 (2005) 77 - [A67]
2. T.Koike, K.Starosta, P.Joshi, G.Rainovski, J.Timar, C.Vaman and R.Wadsworth, J. Phys. G 31 (2005) S1741 - [A67]
3. J.Timar, C.Vaman, K.Starosta, D.B.Fossan, T.Koike, D.Sohler, I.Y.Lee and A.O.Macchiavelli, Phys. Rev. C 73 (2006) 011301(R) - [A67]
4. C.M.Petrache, Int. J. Mod. Phys. E-Nucl. Phys. 15 (2006) 1897 -[A67]

A68) DECAY-OUT OF THE HIGHLY DEFORMED BAND IN  $^{133}\text{Nd}$   
 R.Peusquens, R.S.Chakrawarthy, A.Dewald, P.Petkov, P. von Brentano, R.Krücken, S.Kasemann, H.Tiesler, K.O.Zell, S.Lunardi, D.Bazzacco, F.Brandolini, N.H.Medina, P.Pavan, C.M.Petrache, C.Rossi-Alvarez, G. de Angelis, G.Maron, M. de Poli and D.R.Napoli

**Physical Review C72 (2005) 031304**

1. Y.Khazov, A.Rodionov, F.G.Kondev, Nuclear Data Sheets 112 (2011) 855 - [A68]

A69) TEST OF THE CRITICAL POINT SYMMETRY X(5) IN THE MASS A=180 REGION

A.Dewald, O.Möller, B.Saha, K.Jessen, A.Fitzler, B.Melon, T.Pissulla, S.Heinze, J.Jolie, K.O.Zell, P. von Brentano, P.Petkov, S.Harissopoulos, G. De Angelis, T.Martinez, D.R.Napoli, N.Marginean, M.Axiotis, C.Rusu, D.Tonev, A.Gadea, Y.H.Zhang, D.Bazzacco,

S.Lunardi, C.Ur, R.Menegazzo and E.Farnea  
**Journal of Physics G31 (2005) S1427**

1. C.E.Alonso, J.M.Arias and A.Vitturi, Phys. Rev. C 75 (2007) 064316 - [A69]
2. R.F.Casten and E.A.McCutchan, J. Phys. G 34 (2007) R285 - [A69]
3. R.F.Casten, Nature Physics 2 (2006) 811 - [A69]
4. X.Hao, L.H.Zhu, X.G.Wu, G.S.Li, B.Pan, L.L.Wang, Y.Zheng, L.Wang, X.Q.Li, Y.Liu, H.B.Ding and Z.Y.Li, Chinese Physics C 33 Suppl. 1 (2009) 151 - [A69]
5. R.F.Casten, Prog. Part. Nucl. Phys. 62 (2009) 183 - [A69]
6. I.Boztosun, D.Bonatsos and I.Inci, Phys. Rev. C 77 (2008) 044302 - [A69]
7. D.Bonatsos, D.Lenis and D.Petrellis, Romanian Reports in Physics 59 (2007) 273 - [A69]
8. E.Williams, R.J.Casperson and V.Werner, Phys. Rev. C 81 (2010) 054306 - [A69]
9. E.Achterberg, O.A.Capurro and G.V.Marti, Nuclear Data Sheets 110 (2009) 1473 - [A69]
10. L.R.Dai, W.X.Teng, F.Pan, and S.H.Wang, Chinese Phys. Lett. 28 (2011) 052101 - [A69]
11. X.Hao, L.H.Zhu, X.G.Wu, C.Y.He, B.Pan, Y.Zheng, L.L.Wang, L.Wang, X.Q.Li, Y.Liu, H.B.Ding, Z.Y.Li, J.F.Zhang, H.B.Sun, and G.S.Li, J. Phys. G 38 (2011) 025102 - [A69]
12. E.Williams, R.J.Casperson and V.Werner, Phys. Rev. C 82 (2010) 054308 - [A69]
13. X.Hao, L.H.Zhu, X.G.Wu, C.Y.He, Y.Zheng, L.H.Li, H.B.Sun, and G.S.Li, Chinese Phys. Lett. 28 (2011) 112101 - [A69]
14. A.Giannatiempo, Phys. Rev. C 84 (2011) 024308 - [A69]
15. C.B.Li, X.G.Wu, X.F.Li, C.Y.He, Y.Zheng, G.S.Li, S.H.Yao, H.P.Hu, H.W.Li, J.L.Wang, J.J.Liu, C.Xu, J.J.Sun, and W.W.Qu, Phys. Rev. C 86 (2012) 057303 - [A69]
16. C.Y.He, X.G.Wu, Y.Zheng, C.B.Li, X.Fang, Chinese Physics C 38 (2014) 024101 - [A69]
17. A.A.Raduta, P.Buganu, Phys. Rev. C 88 (2013) 064328 - [A69]

A70) LIFETIME MEASUREMENTS IN THE YRAST MAGNETIC BAND IN  
 $^{193}\text{Pb}$

K.A.Gladnishki, D.L.Balabanski, P.Petkov, A.Dewald, D.Tonev, M.Axiotis, A.Fitzler, M.Danchev, S.Harissopoulos, S.Lalkovski, N.Marginean, T.Martinez, O.Moeller, G.Neyens, A.Spyrou, E.A.Stefanova and C.Ur

**Journal of Physics G31 (2005) S1559**

A71) CHECK FOR CHIRALITY IN REAL NUCLEI

D.Tonev, G. de Angelis, P.Petkov, A.Dewald, A.Gadea, P.Pejovic, D.L.Balabanski, P.Bednarczyk, F.Camera, A.Fitzler, O.Möller, N.Marginean, A.Paleni, C.Petrache, K.O.Zell and Y.H.Zhang

**European Physical Journal A25, Supplement 1 (2005) 447-448**

A72) RDDS LIFETIME MEASUREMENT WITH JUROGAM + RITU

T.Grahn, A.Dewald, O.Möller, C.W.Beausang, S.Eeckhaudt, P.T.Greenlees, J.Jolie, P.Jones, R.Julin, S.Juutinen, H.Kettunen, T.Kröll, R.Krücken, M.Leino, A.-P.Leppänen, P.Maierbeck, D.A.Meyer, P.Nieminen, M.Nyman, J.Pakarinen, P.Petkov, P.Rahkila, B.Saha, C.Scholey and J.Uusitalo

**European Physical Journal A25, Supplement 1 (2005) 441-442**

1. D.A.Meyer, C.W.Beausang, J.J.Ressler, H.Ai, H.Amro, M.Babilon, R.F.Casten, C.R.Fitzpatrick, G.Gurdal, A.Heinz, E.A.McCutchan, C.Plettner, J.Qian, N.J.Thomas, V.Werner, E.Williams, N.V.Zamfir and J.Y.Zhang, Phys. Rev. C 73 (2006) 024307 - [A72]
2. A.Goergen, J. Phys. G 37 (2010) 103101 - [A72]

A73) NEW HIGH-SPIN STATES OF  $^{147}\text{Nd}$  AND  $^{145}\text{Ce}$ : OCTUPOLE CORRELATION IN THE N=87 ISOTONES

Ts.Venkova, M.-G.Porquet, A.Astier, I.Deloncle, P.Petkov, A.Prévost, F.Azaiez, A.Bogachev, A.Butia, D.Curien, O.Dorvaux, G.Duchêne, J.Durell, B.J.P.Gall, M.Houry, F.Khalfallah, R.Lucas, M.Meyer, I.Piqueras, N.Redon, A.Roach, M.Rousseau, O.Stézowski and Ch.Theisen

**European Physical Journal A26 (2005) 315-319**

- 1.N.Nica, Nuclear Data Sheets 110 (2009) 749 - [A73]

- 2.E.Browne and J.K.Tuli, Nuclear Data Sheets 110 (2009) 507 - [A73]

A74) TRANSITION PROBABILITIES IN  $^{134}\text{Pr}$ : A TEST FOR CHIRALITY IN NUCLEAR SYSTEMS

D.Tonev, G. de Angelis, P.Petkov, A.Dewald, S.Brant, S.Frauendorf, D.L.Balabanski, P.Pejovic, D.Bazzacco, P.Bednarczyk, F.Camera, A.Fitzler, A.Gadea, S.Lenzi, S.Lunardi, N.Marginean, O.Möller, D.R.Napoli, A.Paleni, C.M.Petrache, G.Prete, K.O.Zell, Y.H.Zhang,

Jing-ye Zhang, Q.Zhong, and D. Curien  
**Physical Review Letters 96 (2006) 052501**

1. J.Timar, T.Koike, N.Pietralla, G.Rainovski, D.Sohler, T.Ahn, G.Berek, A.Costin, K.Dusling, T.C.Li, E.S.Paul, K.Starosta and C.Vaman, Phys. Rev. C 76 (2007) 024307 - [A74]
2. E.Grodner, S.G.Rohozinski and J.Srebrny, Acta Phys. Pol. B 38 (2007) 1411 - [A74]
3. P.Joshi, M.P.Carpenter, D.B.Fossan, T.Koike, E.S.Paul, G.Rainovski, K.Starosta, C.Vaman and R.Wadsworth, Phys. Rev. Lett. 98 (2007) 102501 - [A74]
4. S.Y.Wang, S.Q.Zhang, B.Qi and J.Meng, Phys. Rev. C 75 (2007) 024309 - [A74]
5. S.Y.Wang, S.Q.Zhang, B.Qi and J.Meng, Chinese Physics Letters 24 (2007) 664 - [A74]
6. Y.S.Chen and Z.C.Gao, High Energy Physics and Nuclear Physics-Chinese Edition 30 Suppl.2 (2006) 14 - [A74]
7. B.Qi, S.Q.Zhang, S.Y.Wang and J.Meng, High Energy Physics and Nuclear Physics-Chinese Edition 30 Suppl. 2 (2006) 112 - [A74]
8. S.Y.Wang, S.Q.Zhang, B.Qi and J.Meng, High Energy Physics and Nuclear Physics-Chinese Edition 30 Suppl. 2 (2006) 169 - [A74]
9. N.Yoshinaga and K.Higashiyama, Eur. Phys. J. A 30 (2006) 343 - [A74]
10. E.Grodner, J.Srebrny, A.A.Pasternak, I.Zalewska, T.Morek, C.Droste, J.Mierzejewski, M.Kowalczyk, J.Kownacki, M.Kisielski, S.G.Rohozinski, T.Koike, K.Starosta, A.Kordyasz, P.J.Napiorkowski, M.Wolinska-Cichocka, E.Ruchowska, W.Plociennik and J.Perkowski, Phys. Rev. Lett. 97 (2006) 172501 - [A74]
11. E.A.Lawrie and O.Shirinda, Phys. Lett. B 689 (2010) 66 - [A74]
12. J.Meng and S.Q.Zhang, J. Phys. G 37 (2010) 064025 - [A74 ]
13. T.Koike, Nucl. Phys. A 834 (2010) 36c - [A74]
14. J.M.Yao, B.Qi, S.Q.Zhang, J.Peng, S.Y.Wang and J.Meng, Phys. Rev. C 79 (2009) 067302 - [A74]
15. S.Y.Wang, S.Q.Zhang, B.Qi and J.Meng, Chinese Physics C 33 Suppl. 1 (2009) 37 - [A74]
16. B.Qi, J.Meng, S.Q.Zhang, S.Y.Wang, and J.Peng, Chinese Physics C 33 Suppl.1 (2009) 43 - [A74]
17. L.L.Wang, X.G.Wu, L.H.Zhu, G.S.Li, X.Hao, Y.Zheng, C.Y.He, L.Wang, X.Q.Li, Y.Liu, B.Pan, Z.Y.Li, and H.B.Ding, Chinese Physics C 33 Suppl.1 (2009) 173 - [A74]
18. S.Y.Wang, S.Q.Zhang, B.Qi, and J.Meng, Chinese Physics C 32 Suppl.2 (2008) 138 - [A74]
19. K.Higashiyama and N.Yoshinaga, Progress of Theoretical Physics 120 (2008) 525 - [A74]

20. J.Meng, B.Qi, S.Q.Zhang, and S.Y.Wang, Modern Physics Letters A 23 (2008) 2560 - [A74]
21. S.Y.Wang, S.Q.Zhang, B.Qi, J.Peng, J.M.Yao, and J.Meng, Phys. Rev. C 77 (2008) 034314 - [A74]
22. J.Peng, H.Sagawa, S.Q.Zhang, J.M.Yao, Y.Zhang, and J.Meng, Phys. Rev. C 77 (2008) 024309 - [A74]
23. K.Higashiyama and N.Yoshinaga, Eur. Phys. J. A 33 (2007) 355 - [A74]
24. B.Qi, S.Q.Zhang, S.Y.Wang, J.M.Yao and J.Meng, Phys. Rev. C 79 (2009) 041302 - [A74]
25. S.Q.Zhanh, B.Qi, S.Y.Wang and J.Meng, Phys. Rev. C 75 (2007) 044307 - [A74]
26. E.A. Lawrie, P.A. Vymers, C. Vieu, J.J. Lawrie, C. Schuck, R.A.Bark, R. Lindsay, G.K. Mabala, S.M. Maliage, P.L. Masiteng, S.M. Mullins, S.H.T. Murray, I. Ragnarsson, T.M. Ramashidzha, J.F. Sharpey-Schafer, O. Shirinda, Eur. Phys. J. A 45 (2010) 39 - [A74]
27. J.Meng, Int. J. Mod. Phys. E 20 (2011) 341 - [A74]
28. O.Shirinda and E.Lawrie, Int. J. Mod. Phys. E 20 (2011) 358 - [A74]
29. E.Grodner, Int. J. Mod. Phys. E 20 (2011) 380 - [A74]
30. B.Qi, S.Q.Zhang, S.Y.Wang, J.Meng, and T.Koike, Phys. Rev. C 83 (2011) 034303 - [A74]
31. Q.B.Chen, J.M.Yao, S.Q.Zhang, and B.Qi, Phys. Rev. C 82 (2010) 067302 - [A74]
32. A.A.Pasternak, Physics of Atomic Nuclei 73 (2010) 1351 - [A74]
33. J.Meng, S.Q.Zhang, B.Qi and S.Y.Wang, J. Phys. Conf. Series 205 (2010) - [A74]
34. S.Y.Wang, B.Qi, L.Liu, S.Q.Zhang, H.Hua, X.Q.Li, Y.Y.Chen, L.H.Zhu, J.Meng, S.M.Wyngaardt, P.Papka, T.T.Ibrahim, R.A.Bark, P.Datta, E.A.Lawrie, J.J.Lawrie, S.N.T.Majola, P.L.Masiteng, S.M.Mullins, J.Gal, G.Kalinka, J.Molnar, B.M.Nyako, J.Timar, K.Juhasz, and R.Schwengner, Phys. Lett. B. 703 (2011) 40 - [A74]
35. E.Grodner, I.Sankowska, T.Morek, S.G.Rohozinski, C.Droste, J.Srebrny, A.A.Pasternak, M.Kisielinski, M.Kowalczyk, J.Kownacki, J.Mierzejewski, A.Krol, and K.Wrzosek, Phys. Lett. B 703 (2011) 46 - [A74]
36. G.Rainovski, DSc Thesis, Sofia University 2012 - [A74]
37. O.Shirinda and E.A.Lawrie, Eur. Phys. J. A 48 (2012) 118 -[A74]
38. X.G.Wu, L.L.Wang, L.H.Zhu, G.S.Li, X.Hao, Y.Zheng, C.Y.He, X.Q.Li, B.Pan, Y.Liu, L.Wang, Y.X.Zhao, Z.Y.Li, and H.B.Ding, Plasma Science and Technology 14, (2012) Issue: 6 -[A74]
39. B.Qi, H.Jia, N.B.Zhang, C.Liu, and S.Y.Wang, Phys. Rev. C 88 (2013) 027302 -[A74]
40. K.Y.Ma, J.B.Lu, D.Yang, H.D.Wang, Y.Z.Liu, J.Li, G.Y.Liu, L.Li, Y.J.Ma, X.G.Wu, G.S.Li, Y.Zheng, and C.Y.He, Chinese Physics C 37 (2013) 044001-[A74]

41. R.Garg, S.Kumar, M.Saxena, S.Goyal, D.Siwal, S.Verma, R.Palit, S.Saha, J.Sethi, S.K.Sharma, T.Trivedi, S.K.Jadav, R.Donthi, B.S.Naidu, and S.Mandal, Phys. Rev. C 87 (2013) 034317 -[A74]
42. P.L.Masiteng, E.A.Lawrie, T.M.Ramashidzha, J.J.Lawrie, R.A.Bark, R.Lindsay, F.Komati, J.Kau, P.Maine, S.M.Maliage, I.Matamba, S.M.Mullins, S.H.T.Murray, K.P.Mutshena, A.A.Pasternak, D.G.Roux, J.F.Sharpey-Schafer, O.Shirinda, P.A.Vymers, Eur. Phys. J. A 50 (2014) 119 - [A74]
43. M.Ionescu-Bujor, A.Iordachescu, N.Marginean, R.Lica, D.Bucurescu, F.Brandolini, D.Deleanu, D.Filipescu, I.Gheorghe, D.Ghita, T.Glodariu, R.Marginean, N.H.Medina, C.Mihai, A.Negret, L.Stroe, C.A.Ur, Phys. Rev. C 90 (2014) 014323 - [A74]
44. Y.Zheng, L.H.Zhu, X.G.Wu, C.Y.He, G.S.Li, X.Hao, B.B.Yu, S.H.Yao, B.Zhang, C.Xu, J.G.Wang, L.Gu, Chinese Physics Letters 31 (2014) 062101 - [A74]
45. E.O.Lieder, R.M.Lieder, R.A.Bark, Q.B.Chen, S.Q.Zhang, J.Meng, E.A.Lawrie, J.J.Lawrie, S.P.Bvumbi, N.Y.Kheswa, S.S.Ntshangase, T.E.Madiba, P.L.Masiteng, S.M.Mullins, S.Murray, P.Papka, D.G.Roux, O.Shirinda, Z.H.Zhang, P.W.Zhao, Z.P.Li, J.Peng, B.Qi, S.Y.Wang, Z.G.Xiao, C.Xu, Phys. Rev. Lett. 112 (2014) 202502 - [A74]
46. N.Rather, P.Datta, S.Chatopadhyay, S.Rajbanshi, A.Goswami, G.H.Bhat, J.A.Sheikh, S.Roy, R.Palit, S.Pal, S.Saha, J.Sethi, S.Biswas, P.Singh, H.C.Jain, Phys. Rev. Lett. 112 (2014) 202503 - [A74]
47. G.H.Bhat, R.N.Ali, J.A.Sheikh, R.Palit, Nucl. Phys. A 922 (2014) 150 - [A74]

A75) LOW-LYING STATES IN  $^{195}\text{Pt}$  DESCRIBED BY THE PARTICLE-ROTOR MODEL

P.Petkov, P. von Brentano and J.Jolie

**European Physical Journal A27 (2006) 53-58**

A76) SYMMETRY OF ISOSCALAR MATRIX ELEMENTS AND SYSTEMATICS IN THE sd AND BEGINNING OF fp SHELLS

J.N.Orce, P.Petkov, V.Velazquez, C.J.McKay, S.R.Lesher, S.Choudry, M.Mynk, A.Linnemann, J.Jolie, P. von Brentano, V.Werner, S.W.Yates and M.T.McEllistrem

in *Capture Gamma-Ray Spectroscopy and Related Topics: 12<sup>th</sup> International Symposium*, eds. A.Woehr and A.Aprahamian, (American Institute of Physics Conf. Proc. 819, 2006) pp.96-100

A77) A NEW PROCEDURE FOR LIFETIME DETERMINATION USING THE  
DOPPLER-SHIFT ATTENUATION METHOD

P.Petkov, A.Dewald and P. von Brentano

**Nuclear Instruments and Methods in Physics Research A560 (2006)  
564-570**

1. J.F.Ziegler, M.D.Ziegler, and J.P.Biersack, Nuclear Instruments and Methods in Physics Research Section B -Beam Interactions with Materials and Atoms 268 (2010) 1818 - [A77]
2. C.W.Reich, Nuclear Data Sheets 113 (2012) 2537 -[A77]

A78) ELECTROMAGNETIC TRANSITION STRENGTHS IN  $^{156}\text{Dy}$

O.Möller, A.Dewald, P. Petkov, B.Saha, A.Fitzler, K.Jessen, D.Tonev, T.Klug, S. Heinze, J.Jolie, P.von Brentano, D.Bazzacco, C.A. Ur, E.Farnea, M.Axiotis, S.Lunardi, G. de Angelis, D.R. Napoli, N. Marginean, T. Martinez, M.A. Caprio and R.F.Casten  
**Physical Review C74 (2006) 024313**

- 1.H.G.Ganev HG and A.I.Georgieva, Phys. Rev. C 76 (2007) 054322 -[A78]
2. P.G.Bizzeti and A.M. Bizzeti-Sona, Phys. Rev. C 81 (2010) 034320 - [A78]
3. Z.F.Hou, Y.Zhang and Y.X.Liu, Phys. Rev. C 80 (2009) 054308 - [A78]
4. Y.Zhang, Z.F.Hou ZF and Y.X.Liu, Science in China Series G-Physics Mechanics and Astronomy 52 (2009) 1579 - [A78]
5. L.R.Dai, W.X.Teng, F.Pan, and S.H.Wang, Chinese Phys. Lett. 28 (2011) 052101 - [A78]
6. K.Heyde and J.L.Wood, Rev. Mod. Phys. 83 (4) (2011) - [A78]
7. C.W.Reich, Nuclear Data Sheets 113 (2012) 2537 -[A78]
8. A.Giannatiempo, L.Fortunato, and A.Vitturi, Phys. Rev. C 86 (2012) 034311 -[A78]

A79) COLLECTIVITY AND CONFIGURATION MIXING IN  $^{186,188}\text{Pb}$  and  $^{194}\text{Po}$

T.Grahn, A.Dewald, O.Möller, R.Julin, C.W.Beausang, S.Christen, I.G.Darby, S.Eeckhaudt, P.T.Greenlees, A.Görgen, K.Helariutta, J.Jolie, P.Jones, S.Juutinen, H.Kettunen, T.Kroll, R.Krücken, Y.Le Coz, M.Leino, A.-P.Leppanen, P.Maierbeck, D.A.Meyer, B.Melon, P.Nieminne, M.Nyman, R.D.Page, J.Pakarinen, P.Petkov, P.Rahkila, B.Saha, M.Sandzelius, J.Saren, C.Scholey and J.Uusitalo

**Physical Review Letters 97 (2006) 062501**

1. M.Ionescu-Bujor, A.Iordachescu, N.Marginean, C.A.Ur, D.Bucurescu, G.Suliman, D.L.Balabanski, F.Brandolini, S.Chmel, P.Detistov, K.A.Gladniski, H.Hubel, S.Mallion, R.Marginean, N.H.Medina, D.R.Napoli, G.Neyens, P.Pavan, R.V.Ribas, C.Rusu, K.Turzo and N.Vermeulen, Phys. Lett. B 650 (2007) 141 - [A79]
2. C.Xu and Z.Z.Ren, Phys. Rev. C 75 (2007) 044301 - [A79]
3. H. De Witte, A.N.Andreyev, N.Barre, M.Bender, T.E.Cocolios, S.Dean, D.Fedorov, V.N.Fedoseyev, L.M.Fraile, S.Franchoo, V.Hellemans, P.H.Heenen, K.Heyde, G.Huber, M.Huyse, H.Jeppesen, U.Koster, P.Kunz, S.R.Lesher, B.A.Marsh, I.Mukha, B.Roussiere, J.Sauvage, M.Seliverstov, I.Stefanescu, E.Tengborn, K. Van de Vel, J. Van de Walle, P. Van Duppen P and Yu. Volkov, Phys. Rev. Lett. 98 (2007) 112502 - [A79]
3. J.Sauvage, J.Genevey, B.Roussiere, S.Franchoo, A.N.Andreyev, N.Barre, J.F.Clavelin, H. De Witte, D.V.Fedorov, V.N.Fedoseyev, L.M.Fraile, X.Grave, G.Huber, M.Huyse, H.B.Jeppesen, U.Koster, P.Kunz, S.R.Lesher, B.A.Marsh, I.Mukha, J.Oms, M.Seliverstov, I.Stefanescu, K. Van de Vel, J. Van de Walle, P. Van Duppen and Y.M.Volkov, Eur. Physi. J. A 39 (2009) 33 - [A79]
4. V.Hellemans, S. De Baerdemacker and K.Heyde, Phys. Rev. C 77 (2008) 064324 - [A79]
5. M.Bender, Eur. Phys. J. Special Topics 156 (2008) 217 - [A79]
6. M.D.Seliverstov, A.N.Andreyev, N.Barre, A.E.Barzakh, S.Dean H. De Witte, D.V.Fedorov, V.N.Fedoseyev, L.M.Fraile, S.Franchoo, J.Genevey, G.Huber, M.Huyse, U.Koster, P.Kunz, S.R.Lesher, B.A.Marsh, I.Mukha, B.Roussiere, J.Sauvage, I.Stefanescu, K. Van de Vel, P. Van Duppen, and Y.M.Volkov, Eur. Phys. J. A 41 (2009) 315 - [A79]
7. J.E.Garcia-Ramos and K.Heyde, Nucl. Phys. A 825 (2009) 39 - [A79]
8. Y.Shi, F.R.Xu, H.L.Liu, and P.M.Walker, Phys. Rev. C 82 (2010) 044314 - [A79]
9. A.Gorgen, J. Phys. G 37 (2010) 103101 - [A79]
10. K.Heyde and J.L.Wood, Rev. Mod. Phys. 83 (4) (2011) - [A79]
11. J.E.Garcia-Ramos, V.Hellemans and K.Heyde, Phys. Rev. C 84 (2011) 014331 - [A79]
12. K.Nomura, R.Rodriguez-Guzman, L.M.Robledo, and N.Shimizu, Phys. Rev. C 86 (2012) 034322 - [A79]
13. M.Veselsky, A.N.Andreyev, S.Antalic, M.Huyse, P.Moeller, K.Nishio, A.J.Sierk, P. Van Duppen, and M.Venhart, Phys. Rev. C 86 (2012) 024308 - [A79]
14. J.M.Yao, M.Bender, and P.-H.Heenen, Phys. Rev. C 87 (2013) 034322 -[A79]
11. C.Plaisir, L.Gaudefroy, V.Meot, A.Blanc, J.M.Daugas, O.Roig, N.Arnal, T.Bonnet, F.Gobet, F.Hannachi, M.Tarisien, M.Versteegen, T.Roger, M.Rejmund, A.Navin, C.Schmitt, G.Fremont, J.Goupil, J.Pancin, C.Spitaels, M.Zielinska, Phys. Rev. C 89 (2014) 021302 -[A79]
12. J.E.Garcia-Ramos, K.Heyde, Phys. Rev. C 89 (2014) 014306 - [A79]

A80) MEASUREMENT OF LIFETIMES IN  $^{46}\text{V}$  WITH THE EUROBALL  $\gamma$ -RAY SPECTROMETER

K.Jessen, O.Möller, A.Dewald, P.von Brentano, A.Fitzler, J.Jolie, B.Saha, P.Petkov, F.Brandolini, A.Gadea, S.M.Lenzi, G.de Angelis, E.Farnea, D.R.Napoli and B.J.P.Gall

**Physical Review C74 (2006) 021304**

A81) LIFETIME MEASUREMENTS IN  $^{134}\text{Pr}$  AND CHIRALITY IN NUCLEI

D.Tonev, P.Petkov, D.L.Balabanski, G.De Angelis, A.Gadea, D.R.Napoli, N.Marginean, A.Dewald, P.Pejovic, A.Fitzler, O.Möller, K.O.Zell, S.Brant, S.Frauendorf, D.Bazzacco, S.Lenzi, S.Lunardi, P.Bednarczyk, D.Curien, C.Petrache, Q.Zhong, Y.H.Zhang and J.-Y.Zhang

**International Journal of Modern Physics E15 (2006) 1531**

A82) NEW SPIN ASSIGNMENTS IN THE ODD-ODD  $N = Z$  NUCLEUS  $^{42}\text{Sc}$  AND THE BREAKING OF THE  $^{40}\text{Ca}$  CORE

C.Scholl, P.Petkov, V.Werner, A.Linnemann, T.Adachi, A.Dewald, A.Fitzler, C.Fransen, Y.Fujita, J.Jolie, K.Langanke, A.F.Lisetskiy, G.Martinez-Pinedo, D.Mucher, J.N.Orce, N.Pietralla, N.Warr, K.O.Zell and P.von Brentano

**Physical Review C75 (2007) 064321**

1. F.H.Al-Khudair, Chinese Physics C 33 (2009) 538 - [A82]

A83) QUESTION OF DYNAMIC CHIRALITY IN NUCLEI: THE CASE OF  $^{134}\text{Pr}$

D.Tonev, G. de Angelis, S.Brant, S.Frauendorf, P.Petkov, A.Dewald, F.Dönau, D.L.Balabanski, Q.Zhong, P.Pejovic, D.Bazzacco, P.Bednarczyk, F.Camera, D.Curien, F.Della Vedova, A.Fitzler, A.Gadea, G.Lo Bianco, S.Lenzi, S.Lunardi, N.Marginean, O.Möller, D.R.Napoli, R.Orlandi, E.Sahin, A.Saltarelli, J.Valiente-Dobon, K.O.Zell, Jing-ye Zhang and Y.H.Zhang

**Physical Review C76 (2007) 044313**

1. E.A.Lawrie and O.Shirinda, Phys. Lett. B 689 (2010) 66 - [A83]

2. J.Meng and S.Q.Zhang, J. Phys. G 37 (2010) 064025 - [A83]

3. D.M.Cullen, P.J.R.Mason, S.V.Rigby, C.Scholey, S.Eeckhaut, T.Grahn, P.T.Greenlees, U.Jakobsson, P.M.Jones, R.Julin, S.Juutinen, S.Ketelhut, A.M.Kishada, M.Leino, A.-P.Leppanen, K.Mantyniemi, P.Niemenen, M.Nyman, J.Pakarinen, P.Peura, P.Rahkila, J.Saren, J.Sorri, J.Uusitalo, B.J.Varley and M.Venhart, Phys. Rev. C 80 (2009) 024303 - [A83]
4. B.Qi, S.Q.Zhang, S.Y.Wang, J.M.Yao and J.Meng, Phys. Rev. C 79 (2009) 041302 - [A83]
5. E.A. Lawrie, P.A. Vymers, C. Vieu, J.J. Lawrie, C. Schuck, R.A.Bark, R. Lindsay, G.K. Mabala, S.M. Maliage, P.L. Masiteng, S.M. Mullins, S.H.T. Murray, I. Ragnarsson, T.M. Ramashidzha, J.F. Sharpey-Schafer, O. Shirinda, Eur. Phys. J. A 45 (2010) 39 - [A83]
6. J.Meng, Int. J. Mod. Phys. E 20 (2011) 341 - [A83]
7. O.Shirinda and E.Lawrie, Int. J. Mod. Phys. E 20 (2011) 358 - [A83]
8. J.Meng, S.Q.Zhang, B.Qi and S.Y.Wang, J. Phys. Conf. Series 205 (2010) - [A83]
9. E.A.Lawrie, P.A.Vymers, C.Vieu, J.J.Lawrie, C.Schuck, R.A.Bark, R.Lindsay, G.K.Mabala, S.M.Maliage, P.L.Masiteng, S.M.Mullins, S.H.T.Murray, I.Ragnarsson, T.M.Ramashidzha, J.F.Sharpey-Schafer, and O.Shirinda, Eur. Phys. J. A 45 (2010) 39 - [A83]
10. G.Rainovski, DSc Thesis, Sofia University 2012 - [A83]
11. P.L.Masiteng, E.A.Lawrie, T.M.Ramashidzha, J.J.Lawrie, R.A.Bark, R.Lindsay, F.Komati, J.Kau, P.Maine, S.M.Maliage, I.Matamba, S.M.Mullins, S.H.T.Murray, K.P.Mutshena, A.A.Pasternak, D.G.Roux, J.F.Sharpey-Schafer, O.Shirinda, P.A.Vymers, Eur. Phys. J. A 50 (2014) 119 - [A83]
12. Y.Zheng, L.H.Zhu, X.G.Wu, C.Y.He, G.S.Li, X.Hao, B.B.Yu, S.H.Yao, B.Zhang, C.Xu, J.G.Wang, L.Gu, Chinese Physics Letters 31 (2014) 062101 - [A83]
13. G.H.Bhat, R.N.Ali, J.A.Sheikh, R.Palit, Nucl. Phys. A 922 (2014) 150 - [A83]

A84) DOUBLET STRUCTURE OF THE NEGATIVE-PARITY STATES IN  
 $^{195}\text{Pt}$  SUPPORTED BY PARTICLE-ROTOR CALCULATIONS  
 P.Petkov, P.von Brentano, J.Jolie and R.V.Jolos  
**Physical Review C76 (2007) 044318**

1. Q.Xu Q, S.J.Zhu, J.H.Hamilton, A.V.Ramayya, J.K.Hwang, B.Qi, J.Meng, J.Peng, Y.X.Luo, J.O.Rasmussen, I.Y.Lee, S.H.Liu, K.Li, J.G.Wang, H.B.Ding, L.Gu, E.Y.Yeoh and W.C.Ma, Phys.Rev. C 78 (2008) 064301 -[A84]
2. J.Meng and S.Q.Zhang, J. Phys. G 37 (2010) 064025 - [A84]
3. S.J.Zhu, J.H.Hamilton, J.G.Wang, H.B.Ding, L.Gu, A.V.Ramayya, J.K.Hwang, S.H.Liu, K.Li, Y.X.Luo, J.O.Rasmussen, I.Y.Lee, Q.Xu, E.Y.Yeoh, Z.G.Xiao, B.Qi

and J.Meng, AIP Conference Proceedings 1235 (2010) 253 - [A84]

4. J.H.Hamilton, S.J.Zhu, Y.X.Luo, A.V.Ramayya, J.O.Rasmussen, J.K.Hwang, J.G.Wang, Q.Xu, H.B.Ding, S.H.Liu, G.M.Ter-Akopian, A.V.Daniel, and Y.Oganessian, AIP Conference Proceedings 1175 (2009) 166 - [A84]

A85) NANOSECOND LIFETIMES AND ELECTROMAGNETIC TRANSITION STRENGTHS IN  $^{196}\text{Au}$

P.Petkov, J.Jolie, S.Heinze, S.E.Drissi, M.Dorthe, J.Gröger and J.L.Schenker  
**Nuclear Physics A796 (2007) 1**

1. D.L.Toufen, P.R.P.Allegro, N.H.Medina, J.R.B.Oliveira, E.W.Cybulski, W.A.Seale, R.Linares, M.A.G.Silveira, R.V.Ribas, Review of Scientific Instruments 85 (2014) 073501 - [A85]

A86) NEW HIGH-SPIN STATES OF  $^{142}_{58}\text{Ce}$  AND  $^{140}_{56}\text{Ba}$  FROM FUSION-FISSION REACTIONS: PROTON EXCITATIONS IN THE N=84 ISOTONES

Ts.Venkova, M.-G.Porquet, I.Deloncle, P.Petkov, A.Astier, A.Prevost, F.Azaiez, A.Bogachev, A.Bută, D.Curien, O.Dorvaux, G.Duchene, J.Durell, B.J.P.Gall, M.Houry, F.Khalfallah, R.Lucas, M.Meyer, I.Piqueras, N.Redon, A.Roach, M.Rousseau, O.Stezowski and Ch.Theisen

**European Physical Journal A34 (2007) 349**

1.T.D.Johnson, D.Symochko, M.Fadil and J.K.Tuli, Nuclear Data Sheets 112 (2011) 1949 - [A86]

A87) COLLECTIVITY IN NEUTRON-DEFICIENT Pb AND Po NUCLEI

T.Grahn, A.Dewald, O.Möller, R.Julin, C.W.Beausang, S.Christen, I.G.Darby, S.Eeckhaudt, P.T.Greenlees, A.Görgen, K.Helariutta, J.Jolie, H.Kettunen, T.Kroll, R.Krücken, P.Jones, S.Juutinen, Y.Le Coz, M.Leino, A.-P.Leppanen, P.Maierbeck, B.Melon, D.A.Meyer, P.Nieminens, M.Nyman, R.Page, J.Pakarinen, P.Petkov, P.Rahkila, B.Saha, M.Sandzelius, J.Saren, C.Scholey, J.Uusitalo

**European Physical Journal Special Topics 150 (2007) 121**

A88) SHAPE COEXISTENCE IN LIGHT Se ISOTOPES: EVIDENCE FOR

## OBLATE SHAPES

J.Ljungvall, A.Görgen, M.Girod, J.-P.Delaroche, A.Dewald, C.Dossat, E.Farnea, W.Korten, B.Melon, R.Menegazzo, A.Obertelli, R.Orlandi, P.Petkov, T.Pissulla, S.Siem, R.P.Singh, J.Srebrny, Ch.Theisen, C.A.Ur, J.J.Valiente-Dobon, K.O.Zell, M.Zielinska

**Physical Review Letters 100 (2008) 102502**

1. D.A.Torres, F.Cristancho, L.L.Andersson, E.K.Johansson, D.Rudolph, C.Fahlander, J.Ekman, R. du Rietz, C.Andreoiu, M.P.Carpenter, D.Seweryniak, S.Zhu, R.J.Charity, C.J.Chiara, C.Hoel, O.L.Pechenaya, W.Reviol, D.G.Sarantites, L.G.Sobotka, C.Baktash, C.H.Yu, B.G.Carlsson and I.Ragnarsson, Phys. Rev. C 78 (2008) 054318 - [A88]
- 2.K.Sato, N.Hinohara, T.Nakatsukasa, M.Matsuo, and K.Matsuyanagi, Progress of Theoretical Physics 123 (2010) 129 - - [A88]
3. D.Abriola and A.A.Sonzogni, Nuclear Data Sheets 111 (2010) 1 - [A88]
4. M.Honma, T.Otsuka, T.Mizusaki, and M.Hjorth-Jensen, Phys. Rev. C 80 (2009) 064323 - [A88]
5. N.Hinohara, T.Nakatsukasa, M.Matsuo, and K.Matsuyanagi, Phys. Rev. C 80 (2009) 014305 - [A88]
6. H.Watanabe, T.Sumikama, S.Nishimura, K.Yoshinaga, Z.Li, Y.Miyashita, K.Yamaguchi, H.Baba, J.S.Berryman, N.Blasi, A.Bracco, F.Camera, J.Chiba, P.Doornenbal, S.Go, T.Hashimoto, S.Hayakawa, C.Hinke, E.Ideguchi, T.Isobe, Y.Ito, D.G.Jenkins, Y.Kawada, N.Kobayashi, Y.Kondo, R.Krucken, S.Kubono, G.Lorusso, T.Nakano, M.Kurata-Nishimura, A.Odahara, H.J.Ong, S.Ota, Z.Podolyak, H.Sakurai, H.Scheit, Y.Shi, K.Steiger, D.Steppenbeck, K.Sugimoto, K.Tajiri, S.Takano, A.Takashima, T.Teranishi, Y.Wakabayashi, P.M.Walker, O.Wieland, F.R.Xu, and H.Yamaguchi, Phys. Lett. B 696 (2011) 186 - [A88]
7. E.A.McCutchan, C.J.Lister, T.Ahn, R.J.Casperson, A.Heinz, G.Ilie, J.Qian, E.Williams, R.Winkler, and V.Werner, Phys. Rev. C 83 (2011) 024310 - [A88]
8. A.Petrovici, K.W.Schmid, O.Andrei and A.Faessler, AIP Conference Proceedings 1304 (2010) 54 - [A88]
9. P. Van Duppen and K.Riisager, J. Phys. G 38 (2011) 024005 - [A88]
10. N.Hinohara, T.Nakatsukasa, M.Matsuo, and K.Matsuyanagi, AIP Conference Proceedings 1175 (2009) 49 - [A88]
11. A.Gade, T.Baugher, D.Bazin, B.A.Brown, C.M.Campbell, T.Glasmacher, G.F.Grinyer, M.Honma, S.McDaniel, R.Meharchand, T.Otsuka, A.Ratkiewicz, J.A.Tostevin, K.A.Walsh, and D.Weisshaar, Phys. Rev. C 81 (2010) 064326 - [A88]
12. K.Heyde and J.L.Wood, Rev. Mod. Phys. 83 (4) (2011) - [A88]
13. T.R.Rodriguez and J.L.Egido, Phys. Lett. B 705 (2011) 255 - [A88]
14. T.J.Ross, C.W.Beausang, R.O.Hughes, N.D.Scielzo, J.T.Burke, J.M.Allmond, C.T.Angell, M.S.Basunia, D.L.Bleuel, R.J.Casperson, J.E.Escher, P.Fallon, R.Hatarik, J.Munson, S.Paschalidis, M.Petri, L.Phair, and J.J.Ressler, Phys. Rev. C 86 (2012) 067301 - [A88]

15. C.Bauer, T.Behrens, V.Bildstein, A.Blavzhev, B.Bruyneel, J.Butterworth, E.Clement, L.Coquard, J.L.Egido, A.Ekstrom, C.R.Fitzpatrick, C.Fransen, R.Gernhaeuser, D.Habs, H.Hess, J.Leske, T.Kroell, R.Kruecken, R.Lutter, P.Marley, T.Moeller, T.Otsuka, N.Patronis, A.Petts, N.Pietralla, T.R.Rodriguez, N.Shimizu, C.Stahl, I.Stefanescu, T.Stora, P.G.Thirolf, D.Voulot, J.V. de Walle, N.Warr, F.Wenander, and A.Wiens, Phys. Rev. C 86 (2012) 034310 - [A88]
16. K.Kaneko, T.Mizusaki, Y.Sun, S.Tazaki, and G. de Angelis, Phys. Rev. Lett. 109 (2012) 092504 - [A88]
17. C.J.Xu, S.Y.Wang, C.Y.Niu, C.Liu, B.Qi, D.P.Sun, L.Liu, P.Zhang, Z.Q.Li, Z.Wang, X.G.Wu, G.S.Li, C.Y.He, Y.Zheng, B.B.Yu, C.B.Li, S.P.Hu, S.H.Yao, X.P.Cao, and J.L.Wang, Phys. Rev. C 86 (2012) 027302 - [A88]
18. A.R.Howe, R.A.Haring-Kaye, J.Doering, N.R.Baker, S.J.Kuhn, S.L.Tabor, S.R.Arora, J.K.Bruckman, and C.R.Hoffman, Phys. Rev. C 86 (2012) 014328 - [A88]
19. P.Reiter, AIP Conf. Proc. 1491 (2012) 48 - [A88]
20. H.Watanabe, J. Phys. Conf. Ser. 381 (2012) - [A88]
21. S.L.Rice, Y.Y.Sharon, N.Benczer-Koller, G.J.Kumbartzki, and L.Zamick, Phys. Rev. C 88 (2013) 044334 -[A88]
22. G.Gurdal, E.A.Stefanova, P.Boutachkov, D.Torres, G.J.Kumbartzki, N.Benczer-Koller, Y.Y.Sharon, L.Zamick, S.J.Q.Robinson, T.Ahn, V.Anagnostatou, C.Bernards, M.Elvers, A.Heinz, G.Ilie, D.Radeck, D.Savran, V.Werner, and E.Williams, Phys. Rev. C 88 (2013) 014301 -[A88]
23. J.N.Orce, J. Phys. Conf. Ser. 455 (2013) 012041 -[A88]
24. A.Petrovici, K.W.Schmid, and A.Faessler, J. Phys. Conf. Ser. 413 (2013) 012007 -[A88]
25. T.J.Ross, C.W.Beausang, R.O.Hughes, N.D.Scielzo, J.T.Burke, J.M.Allmond, C.T.Angell, M.S.Basunia, D.L.Bleuel, R.J.Casperson, J.E.Escher, P.Fallon, R.Hatarik, J.Munson, S.Paschalidis, M.Petri, L.Phair, and J.J.Ressler, Phys. Rev. C 86 (2012) 067301 -[A88]
26. S.E.Agbemava, A.V.Afanasyev, D.Ray, P.Ring, Phys. Rev. C 89 (2014) 054320 -[A88]
27. S.Peru, M.Martini, Eur. Phys. J. A 50 (2014) 88 -[A88]
28. J.J.Liu, Y.Zheng, H.B.Sun, X.G.Wu, C.Y.He, G.S.Li, C.B.Li, S.H.Yao, H.W.Li, S.P.Hu, J.L.Wang, W.W.Qu, C.Xu, J.J.Sun, Eur. Phys. J. A 50 (2014) 84 -[A88]
29. K.Kaneko, Y.Sun, T.Mizusaki, S.Tazaki, Phys. Rev. C 89 (2014) 031302 -[A88]

#### A89) LIFETIMES OF INTRUDER STATES IN $^{186}\text{Pb}$ , $^{188}\text{Pb}$ AND $^{194}\text{Po}$

T.Grahn, A.Dewald, O.Möller, R.Julin, C.W.Beausang, S.Christen, I.G.Darby, S.Eeckhaudt, P.T.Greenlees, A.Görgen, K.Helariutta, J.Jolie, P.Jones, S.Juutinen, H.Kettunen, T.Kroll, R.Krücken, Y.Le Coz, M.Leino, A.-P.Leppanen, P.Maierbeck,

D.A.Meyer, B.Melon, P.Niemenen, M.Nyman, R.D.Page, J.Pakarinen, P.Petkov, P.Rahkila, B.Saha, M.Sandzelius, J.Saren, C.Scholey, J.Uusitalo, M.Bender, P.-H.Heenen  
**Nuclear Physics A 801 (2008) 83**

1. M.Ionescu-Bujor, A.Iordachescu, C.A.Ur, N.Marginean, G.Suliman, D.Bucuresco, F.Brandolini, F. Della Vedova, S.Chmel, S.M.Lenzi, R.Marginean, N.H.Medina, D.R.Napoli, P.Pavan and R.V.Ribas, Phys. Rev. C 81 (2010) 024323 - [A89]
2. R.Rodriguez-Guzman, P.Sarriguren, L.M.Robledo and J.E.Garcia-Ramos, Phys. Rev. C 81 (2010) 024310 - [A89]
3. J.Terasaki, AIP Conference Proceedings 1128 (2009) 48 - [A89]
4. J.E.Garcia-Ramos and K.Heyde, Nucl. Phys. A 825 (2009) 39 - [A89]
5. J.E.Garcia-Ramos, V.Hellemans and K.Heyde, Phys. Rev. C 84 (2011) 014331 - [A89]
- [A89] 5. M.Bender and P.H.Heenen, AIP Conference Proceedings 1090 (2009) 238 - [A89]
6. A.Gorgen, J. Phys. G 37 (2010) 103101 - [A89]
7. K.Heyde and J.L.Wood, Rev. Mod. Phys. 83 (4) (2011) --[A89]
8. T.E.Cocolios, A.N.Andreyev, S.Antalic, A.Barzakh, B.Bastin, J.Buscher, I.G.Darby, W.Dexters, D.V.Fedorov, V.N.Fedosseev, K.T.Flanagan, S.Franchoo, G.Huber, M.Huyse, M.Keupers, U.Koster, Y.Kudryavtsev, E.Mane, B.A.Marsh, P.Molkanov, R.D.Page, M.D.Seliverstov, A.M.Sjoedin, I.Stefan, J. Van de Walle, P. Van Duppen, M.Venhart, and S.Zemlyanoy, J. Phys. G. 37 (2010) 125103 - [A89]
9. K.T.Flanagan, K.M.Lynch, J.Billowes, M.L.Bissell, I.Budincevic, T.E.Cocolios, R.P. de Groote, S. De Schepper, V.N.Fedosseev, S.Franchoo, R.F.G.Ruiz, H.Heylen, B.A.Marsh, G.Neyens, T.J.Procter, R.E.Rossel, S.Rothe, I.Strashnov, H.H.Stroke, and K.D.A.Wendt, Phys. Rev. Lett. 111 (2013) 212501 -[A89]
10. M.Ismail and A.Adel, Nucl. Phys. A 912 (2013) 18-30 -[A89]
11. J.E.Garcia-Ramos, K.Heyde, L.M.Robledo, R.Rodriguez-Guzman, Phys. Rev. C 89 (2014) 034313 -[A89]
12. J.L.Wang, X.G.Wu, C.Y.He, G.S.Li, Q.W.Fan, Y.H.Du, S.P.Hu, Y.Zheng, Y (Zheng Yun)[ 1 ] ; C.B.Li, H.W.Li, J.J.Liu, P.W.Luo, S.H.Yao, Chinese Physics C 38 (2014) 036201 - [A89]
13. J.E.Garcia-Ramos, K.Heyde, Phys. Rev. C 89 (2014) 014306 - [A89]

A90) PARTILCE-TRIAXIAL ROTOR CALCULATIONS FOR THE LOW-LYING STATES WITH NEGATIVE PARITY IN  $^{193}\text{Os}$   
P.Petkov, P. von Brentano, J.Jolie and R.V.Jolos  
**European Physical Journal A 36 (2008) 127**

A91) COLLECTIVITY OF NEUTRON-RICH PALLADIUM ISOTOPES AND THE VALENCE PROTON SYMMETRY

A.Dewald, K.Starosta, P. Petkov, M.Hackstein, W.Rother, P.Adrich, A.M.Amthor, T.Baumann, D.Bazin, M.Bowen, A.Chester, A.Dunomes, A.Gade, D.Galaviz, T.Glasmacher, T.Ginter, M.Hausmann, J.Jolie, B.Melon, D.Miller, V.Moeller, R.P.Norris, T.Pissulla, M.Portillo, Y.Shimbara, A.Stolz, C.Vaman, P.Voss and D.Weisshaar

**Physical Review C78 (2008) 051302(R)**

1. Z.Podolyak, Acta Phys. Polonica B 41 (2010) 493 - [A91]
2. H.Buyukuslu, A.Kaplan, E.Tel, A.Aydin, and G.Yildirim, J. of Fusion Energy 29 (2010) 41 - [A91]
3. S.K.Chamoli, A.E.Stuchbery, S.Frauendorf, J.Sun, Y.Gu, R.F.Leslie, P.T.Moore, A.Wakhle, M.C.East, T.Kibedi, and A.N.Wilson, Phys. Rev. C 83 (2011) 054318 - [A91]
4. A.Gorgen, J. Phys. G 37 (2010) 103101 - [A91]
5. D.A.Torres, G.J.Kumbartzki, Y.Y.Sharon, L.Zamick, B.Manning, N.Benczer-Koller, G.Gurdal, K.H.Speidel, M.Hjorth-Jensen, P.Maier-Komor, S.J.Q.Robinson, T.Ahn, V.Anagnostou, M.Elvers, P.Goddard, A.Heinz, G.Ilie, D.Radeck, D.Savran, and V.Werner, Phys. Rev. C 84 (2011) 044327 -[A91]
6. J.Ljungvall, G.Georgiev, S.Cabaret, N.Karkour, D.Linget, G.Sedes, R.Chevrier, I.Matea, M.Niikura, M.D.Salsac, and B.Sulignano, Nucl. Instr. Meth. Phys. Res. A 679 (2012) 61 -[A91]
7. G.Guerdal and F.G.Kondev, Nuclear Data Sheets 113 (2012) 1315 -[A91]
8. A.Bhat, A.Bharti, and S.K.Khosa, Eur. Phys. J. A 48 (2012) 39 -[A91]
9. W.Wang, N.Aoi, S.Takeuchi, M.Matsushita, P.Doornenbal, T.Motobayashi, D.Steppenbeck, K.Yoneda, H.Baba, L.Caceres, Z.Dombradi, K.Kobayashi, Y.Kondo, J.Lee, K.Li, H.Liu, R.Minakata, D.Nishimura, H.Otsu, S.Sakaguchi, H.Sakurai, H.Scheit, D.Sohler, Y.Sun, Z.Tian, R.Tanaka, Y.Togano, Z.Vajta, Z.Yang, T.Yamamoto, Y.Ye, and R.Yokoyama, Phys. Rev. C 88 (2013) 054318 -[A91]
10. Y.Singh, S.K.Dhiman, M.Singh, C.Bihari, A.K.Varshney, K.K.Gupta, and D.K.Gupta, Can. J. Phys. 91 (2013) 777-782 -[A91]
11. H.Iwasaki, AIP Conf. Proc. 1525 (2013) 581-585 -[A91]
12. D.Radeck, Dissertation, Universität zu Köln (2013) - -[A91]
13. I.Hossain, H.Y.Abdullah, I.M.Ahmad, M.A.Saeed, Chinese Physics C 38 (2014) 024103 - [A91]
14. I.Hossain, M.A.Saeed, N.N.A.M.B.Ghani, H.Sa'adeh, M.Hussein, H.Y.Abdullah, Indian Journal of Physics 88 (2014) 5 - [A91]

A92) CENTRIFUGAL STRETCHING ALONG THE GROUND STATE BAND OF  $^{168}\text{Hf}$

A.Costin, M.Reese, H.Ai, R.F.Casten, K.Dusling, C.R.Fitzpatrick, G.Gurdal, A.Heinz,  
E.A.McCutchan, D.A.Meyer, O.Moller, P.Petkov, N.Pietralla, J.Qian, G.Rainovski,  
V.Werner

**Physical Review C79 (2009) 024307**

1. C.M.Baglin, Nuclear Data Sheets 111 (2010) 1807 - [A92]
2. J.B.Gupta, Eur. Phys. J. 49 Issue: 10 DOI: 10.1140/epja/i2013-13126-4 -[A92]

A93) LOW-LYING NEUTRON INTRUDER STATE IN  $^{13}\text{B}$  AND THE FADING  
OF THE N=8 SHELL CLOSURE

H.Iwasaki, A.Dewald, C.Fransen, A.Gelberg, M.Hackstein, J.Jolie, P.Petkov, T.Pissulla,  
W.Rother and K.O.Zell

**Physical Review Letters 102 (2009) 202502**

1. B.B.Back, S.I.Baker, B.A.Brown, C.M.Deibel, S.J.Freeman, B.J.DiGiovine,  
C.R.Hoffman, B.P.Kay, H.Y.Lee, J.C.Lighthall, S.T.Marley, R.C.Pardo, K.E.Rehm,  
J.P.Schiffer,D.V.Shetty, A.W.Vann, J.Winkelbauer and A.H.Wuosmaa, Phys. Rev.  
Lett. 104 (2010) 132501 - [A93]
2. S.Ettenauer, M.Brodeur, T.Brunner, A.T.Gallant, A.Lapierre, R.Ringle, M.R.Pearson,  
P.Delheij, J.Lassen, D.Lunney, and J.Dilling, Phys. Rev. C 81 (2010) 024314 - [A93]
3. C.J.Guess, R.G.T.Zegers, B.A.Brown, S.M.Austin, D.Bazin, C.Caesar, J.M.Deaven,  
G.F.Grinyer, C.Herlitzius, G.W.Hitt, S.Noji, R.Meharchand, G.Perdikakis, H.Sakai,  
Y.Shimbara, and C.Tur, Phys. Rev. C 80 (2009) 024305 - [A93]
4. D.Suzuki, Eur. Phys. J. A 48 (2012) 130 -[A93]
5. L.G.Sobotka, W.W.Buhro, R.J.Charity, J.M.Elson, M.F.Jager, J.Manfredi,  
M.H.Mahzoon, A.M.Mukhamedzhanov, V.Eremenko, M.McCleskey, R.G.Pizzone, B.T.Roeder,  
A.Spiridon, E.Simmons, L.Trache, M.Kurokawa, and P.Navratal, Phys. Rev. C 87  
(2013) 054329 -[A93]
6. D.Nicolosi, C.Agodi, M.Bondi, F.Cappuzzello, D.Carbone, M.Cavallaro, A.Cunsolo,  
M. De Napoli, A.Foti, R.Linares, and S.Tropea, Acta Physica Polonica B 44 (2013)  
657-661 -[A93]

A94) DEVELOPMENT OF A NEW RECOIL DISTANCE TECHNIQUE USING  
COULOMB EXCITATION IN INVERSE KINEMATICS

W.Rother, A.Dewald, G.Ilie, T.Pissulla, B.Melon, J.Jolie, G.Pascovici, H.Iwasaki,  
M.Hackstein, K.-O.Zell, R.Julin, P.Jones, P.Greenlees, P.Rahkila, J.Uusitalo, C.Scholey,  
S.Harissopoulos, A.Lagoyannis, T.Konstantinopoulos, T.Grahn, D.Balabanski and P.Petkov  
in *Capture Gamma-Ray Spectroscopy and Related Topics: 13<sup>th</sup> International Sym-*

*posium*, eds. A.Blažhev, J.Jolie, N.Warr, and A.Zilges, (American Institute of Physics Conf. Proc. 1090, 2009) pp.107-111

A95) PLUNGER LIFETIME MEASUREMENTS AFTER COULOMB EXCITATION AT INTERMEDIATE BEAM ENERGIES

A.Dewald, K.Starosta, P.Petkov, M.Hackstein, W.Rother, P.Adrich, A.M.Amthor, T.Baumann, D.Bazin, M.Bowen, A.Chester, A.Dunomes, A.Gade, D.Galaviz, T.Glasmacher, T.Ginter, M.Hausmann, J.Jolie, B.Melon, D.Miller, V.Moeller, R.P.Norris, T.Pissulla, M.Portillo, Y.Shimbara, A.Stolz, C.Vaman, P.Voss, and D. Weisshaar

in *Capture Gamma-Ray Spectroscopy and Related Topics: 13<sup>th</sup> International Symposium*, eds. A.Blažhev, J.Jolie, N.Warr, and A.Zilges, (American Institute of Physics Conf. Proc. 1090, 2009) pp.135-139

A96) PARTICLE-TRIAXIAL ROTOR CALCULATIONS AROUND  $^{195}\text{Pt}$

P.Petkov, P. von Brentano, J.Jolie, a R.V.Jolos

in *Capture Gamma-Ray Spectroscopy and Related Topics: 13<sup>th</sup> International Symposium*, eds. A.Blažhev, J.Jolie, N.Warr, and A.Zilges, (American Institute of Physics Conf. Proc. 1090, 2009) pp.159-163

A97) TRANSITION PROBABILITIES IN THE X(5) CANDIDATE  $^{122}\text{Ba}$

P.-G. Bizzeti,A.-M.Bizzeti-Sona, D.Tonev,c C.A.Ur, A.Dewald, A.Giannatiempo, B.Melon, D.Bazzacco, A.Costin, G.de Angelis, F. Della Vedova, M.Fantuzi, E.Farnea, C.Fransen, A.Gadea, S.M.Lenzi, S.Lunardi, N.Marginean, R.Marginean, R.Menegazzo, D.Mengoni, O.Möller, A.Nannini, D.R.Napoli, M.Nespolo, P.Pavan, A.Perego, P.Petkov, C.M.Petrache, N.Pietralla, and C.Rossi Alvarez

in *Capture Gamma-Ray Spectroscopy and Related Topics: 13<sup>th</sup> International Symposium*, eds. A.Blažhev, J.Jolie, N.Warr, and A.Zilges, (American Institute of Physics Conf. Proc. 1090, 2009) pp.352-356

A98) STUDY OF COLLECTIVITY IN  $^{62}\text{Zn}$

M. Albers, D.Mücher, J.Jolie, C.Bernards, A.Blazhev, C.Fransen, P.Petkov, D.Radeck, and K.-O. Zell

in *Capture Gamma-Ray Spectroscopy and Related Topics: 13<sup>th</sup> International Symposium*, eds. A.Blazhev, J.Jolie, N.Warr, and A.Zilges, (American Institute of Physics Conf. Proc. 1090, 2009) pp.399-403

A99) DYNAMIC CHIRALITY IN NUCLEI

D.Tonev, G. de Angelis, S.Brant, P.Petkov and A.Ventura

in *Nuclear Structure and Dynamics '09*, eds. M.Milin, T.Niksic, D.Vretenar, and S.Szilner, (American Institute of Physics Conf. Proc. 1165, 2009) pp.221-224

A100) A NOVEL MANIFESTATION OF  $\alpha$ -CLUSTERING STRUCTURES: NEW ' $\alpha + ^{208}\text{Pb}$ ' STATES IN  $^{212}\text{Po}$  REVEALED BY THEIR ENHANCED E1 DECAYS

A.Astier, P.Petkov, M.-G.Porquet, D.S.Delion and P.Schuck

**Physical Review Letters 104 (2010) 042701**

1. C.Qi, A.N.Andreyev, M.Huyse, R.J.Liotta, R.A.Wyss, Phys. Rev. C 81 (2010) 064319 - [A100]

2. Y.Suzuki, Int. J. Mod. Phys. E 20 (2011) 753 - [A100]

3. D.D.Ni and Z.Z.Ren, Phys. Rev. C 83 (2011) 014310 - [A100]

4. Y.Suzuki and S.Ohkubo, Phys. Rev. C 82 (2010) 041303 - [A100]

5. T.T.Ibrahim, S.M.Perez, and S.M.Wyngaardt, Phys. Rev. C 82 (2010) 034302 - [A100]

6. Ni Dongdong and Ren Zhongzhou, Phys. Rev. C 83 (2011) 067302 -[A100]

7. C.Basu, S.Adhikari, S.Bhattacharya, C.Bhattacharya, T.K.Ghosh, K.Banerjee, T.K.Rana, S.Ray, R.Pandey, G.Prajapati, A.Dey, A.KMitra, and J.K.Meena, AIP Conf. Proc. 1491 (2012) 321-324 -[A100]

8. W.M.Seif, M.Shalaby, and M.F.Alrakshy, Phys. Rev. C 84 (2011) 064608 -[A100]

9. V.F.Comas, S.Heinz, S.Hofmann, D.Ackermann, J.A.Heredia, F.P.Hessberger, J.Khuyagbaatar, B.Kindler, B.Lommel, and R.Mann, Eur. Phys. J. A 49 (2013) 112 -[A100]

10. J.Mitroy, S.Bubin, W.Horiuchi, Y.Suzuki, L.Adamowicz, W.Cencek, K.Szalewicz, J.Komasa, D.Blume, and K.Varga, Rev. Mod. Phys. 85 (2013) 693-749 -[A100]

11. S.M.Wang, J.C.Pe, and F.R.Xu, Phys. Rev. C 87 (2013) 014311 -[A100]

12. S.Courtin, A.Goasduff, and F.Haas, J. Phys. Conf. Ser. 436 (2013) 012051 -[A100]

13. Y.Suzuki, J. Phys. Conf. Ser. 403 (2012) 012030 -[A100]

A101) ULTRAHIGH-RESOLUTION  $\gamma$ -RAY SPECTROSCOPY OF  $^{156}\text{Gd}$ : A TEST OF THE TRAHEDRAL SYMMETRY

M.Jentschel, W.Urban, J.Krempel, D.Tonev, J.Dudek, D.Curien, B.Lauss, G. de Angelis and P.Petkov

**Physical Review Letters 104 (2010) 222502**

1. T.Sumikama, K.Yoshinaga, H.Watanabe, S.Nishimura, Y.Miyashita, K.Yamaguchi, K.Sugimoto, J.Chiba, Z.Li, H.Baba, J.S.Berryman, N.Biasi, A.Bracco, F.Camera, P.Doornenbal, S.Go, T.Hashimoto, S.Hayakawa, C.Hinke, E.Ideguchi, T.Isobe, Y.Ito, D.G.Jenkins, Y.Kawada, N.Kobayashi, Y.Kondo, R.Krucken, S.Kubono, G.Lorusso, T.Nakano, M.Kurata-Nishimura, A.Odahara, H.J.Ong, S.Ota, Z.Podolyak, H.Sakurai, H.Scheit, K.Steiger, D.Steppenbeck, S.Takano, A.Takashima, K.Tajiri, T.Teranishi, Y.Wakabayashi, P.M.Walker, O.Wieland, and H.Yamaguchi, Phys. Rev. Lett. 106 (2011) 202501 - [A101]

2.P.Jachimowicz, P.Rozmaj, M.Kowal, J.Skalski, and A.Sobiczewski, Int. J. Mod. Phys. E 20 (2011) 514 - [A101]

3. A.Gozdz, A.Szulerecka, and A.Dobrowolski, Int. J. Mod. Phys. E 20 (2011) 565 - [A101]

4. S.S.Ntshangase, R.A.Bark, D.G.Aschman, S.Bvumbi, P.Datta, P.M.Davidson, T.S.Dinoko, M.E.A.Elbasher, K.Juhasz, E.M.A.Khaleel, A.Krasznahorkay E.A.Lawrie, J.J.Lawrie, R.M.Lieder, S.N.T.Majola, P.L.Masiteng, H.Mohammed, S.M.Mullins, P.Nieminan, B.M.Nyako, P.Papka, D.G.Roux, J.F.Sharpey-Shafer, O.Shirinda, A.Stankiewicz, J.Timar, and A.N.Wilson, Phys. Rev. C 82 (2010) 041305 - [A101]

5. D.E.Jiang and M.Walter, Phys. Rev. B 84 (2011) 193402 -[A101]

6. J.Zhao, B.N.Lu, E.G.Zhao, and S.G.Zhou, Phys. Rev. C 86 (2012) 057304 -[A101]

7. C.W.Reich, Nuclear Data Sheets 113 (2012) 2537 -[A101]

8. D.G.Roux, K.R.Henninger, R.A.Bark, S.Bvumbi, E.A.Gueorguieva-Lawrie, J.J.Lawrie, S.M.Mullins, S.H.T.Murray, S.S.Ntshangase, L.P.Masiteng, and O.Shirinda, Eur. Phys. J. A 48 (2012) 99 -[A101]

9. A.Gozdz, A.Szulerecka, and A.Pedrak, Physics of Atomic Nuclei 76 (2013) 1026-1032 -[A101]

10. T.Sumikama, Acta Physica Polonica B 44 (2013) 319-325 -[A101]

11. A.Dobrowolski, A.Szulerecka, and A.Gozdz, Acta Physica Polonica B 44 (2013) 111 -[A101]

A102) NEW DEVELOPMENTS ON THE RECOIL DISTANCE DOPPLER-

## SHIFT METHOD

C.Fransen, A.Dewald, T.Baumann, D.Bazin, A.Blazhev, B.A.Brown, A.Chester, A.Gade, T.Glasmacher, P.T.Greenlees, M.Hackstein, S.Harissopoulos, U.Jakobsson, J.Jolie, P.M.Jones, R.Julin, S.Juutinen, S.Ketelhut, T.Konstantinopoulos, A.Lagoyannis, M.Leino, P.Nieminen, M.Nyman, P.Petkov, P.Peura, T.Pissulla, P.Rahkila, W.Rother, P.Ruotsalainen, J.Saren, C.Scholey, J.Sorri, K.Starosta, A.Stolz, J.Uusitalo, P.Voss and D.Weisshaar

**Journal of Physics: Conference Series 205 (2010) 012043**

1. T.Back, C.Qi, B.Cederwall, R.Liotta, F.G.Moradi, A.Johnson, R.Wyss, and R.Wadsworth, Physica Scripta T150 (2012) 014003 -[**A102**]

## A103) FAST TIMING: LIFETIME MEASUREMENTS WITH LaBr<sub>3</sub> SCINTILATORS

I.Deloncle, B.Roussi  re, M.A.Cardona, D.Hojman, J.Kiener, P.Petkov, D.Tonev and Ts. Venkova

**Journal of Physics: Conference Series 205 (2010) 012044**

1. P.H.Regan, Appl. Rad. Isotopes 70 (2012) 1125 -[**A103**]
2. O.J.Roberts, J. Phys. Conf. Ser. 381 (2012) 012124 -[**A103**]

## A104) SEARCH FOR ONE-PHONON MIXED-SYMMETRY STATES IN THE RADIOACTIVE NUCLEUS <sup>140</sup>Nd

K. A. Gladnishki, G. Rainovski, P. Petkov, J. Jolie, N. Pietralla, A. Blazhev, A. Damyanova, M. Danchev, A. Dewald, C. Fransen, M. Hackstein, D. Karagyozov, O. M  ller, T. Pissulla, M. Reese, W. Rother, and R. Topchiyska

**Physical Review C82 (2010) 037302**

1. K.Higashiyama and N.Yoshinaga, Phys. Rev. C 83 (2011) 034321 - [**A104**]
2. D.Bianco, N. Lo Iudice, F.Andreozzi, A.Porrino, and F.Knapp, Phys. Rev. C 86 (2012) 044325 -[**A104**]
3. D.Bianco, F.Andreozzi, N. Lo Iudice, A.Porrino, and F.Knapp, Phys. Rev. C 85 (2012) 034332 -[**A104**]
4. Z.Zenginerler, E.Guliyev, A.A.Kuliev, H.Yakut, and G.Soluk, Eur. Phys. J. A 49 (2013) 107 -[**A104**]
5. D.Bianco, N. Lo Iudice, F.Andreozzi, A.Porrino, and F.Knapp, Phys. Rev. C 88 (2013) 024303 -[**A104**]

6. R.J.Casperson, V.Werner, and S.Heinze, Phys. Lett. B 721 (2013) 51-55  
-[A104]

A105) MULTIPHONON EXCITATIONS IN  $^{62}\text{Zn}$

M. Albers, D. Mcher, C. Bernards, A. Blazhev, C. Fransen, S. Heinze, J. Jolie, A. Lisetskiy, P. Petkov, D. Radeck, and K.O. Zell

**Nuclear Physics A847 (2010) 180-206**

1. A.L.Nichols, B.Singh, and J.K.Tuli, Nuclear Data Sheets 113 (2012) 973 -  
[A105]

2. K.G.Leach, P.E.Garrett, C.E.Svensson, I.S.Towner, G.C.Ball, V.Bildstein, A.D.Varela, R.Dunlop, T.Faestermann, R.Hertenberger, D.J.Jamieson, R.Kruecken, S.Triambak, and H.F.Wirth, Phys. Rev. C 88 (2013) 031306 -[A105]

A106) COEXISTENCE OF  $\alpha + ^{208}\text{Pb}$  CLUSTER STRUCTURES AND SINGLE-PARTICLE EXCITATIONS IN  $^{212}_{84}\text{Po}_{128}$

A.Astier, P.Petkov, M.-G.Porquet, D.S.Delion and P.Schuck

**European Physical Journal A 46 (2010) 165-185**

1. S.Courtin, A.Goasduff, and F.Haas, J. Phys. Conf. Ser. 436 (2013) 012051  
-[A106]

A107) TRANSITION PROBABILITIES IN THE X(5) CANDIDATE  $^{122}\text{Ba}$

P.G.Bizzeti, A.M.Bizzeti-Sona, D.Tonev, A.Giannatiempo, C.A.Ur, A.Dewald, B.Melon, C.Michelagnoli, P.Petkov, D.Bazzacco, A.Costin, G. de Angelis, F. Della Vedova, M.Fantuzi, E.Farnea, C.Fransen, A.Gadea, S.Lenzi, S.Lunardi, N.Marginean, R.Marginean, R.Menegazzo, D.Mengoni, O.Möller, A.Nanini, D.R.Napoli, M.Nespolo, P.Paven, A.Perego, C.M.Petrache, N.Pietralla, C.Rossi Alvarez and P.Sona

**Physical Review C 82 (2010) 054311**

1. A.Giannatiempo, L.Fortunato, A.Vitturi, Phys. Rev. C 86 (2012) 034311 -  
[A107]

A108) IMPROVEMENT OF THE INTRINSIC TIME RESOLVING POWER OF THE COLOGNE IRON-FREE ORANGE TYPE ELECTRON SPECTROMETERS

J.-M.Régis, Th.Materna, G.Pascovici, S.Christen, A.Dewald, C.Fransen, J.Jolie, P.Petkov and K.-O.Zell

**Review of Scientific Instruments 81 (2010) 113505**

A109) PURE  $\alpha$ - $^{208}\text{Pb}$  STATES IN  $^{212}\text{Po}$  REVEALED BY THEIR ENHANCED E1 DECAYS, A NOVEL  $\alpha$  CLUSTERING

A.Astier, P.Petkov, M.-G.Porquet, D.S.Delion, P.Schuck

**International Journal of Modern Physics E20 (2011) 785**

A110) ENHANCED QUADRUPOLE COLLECTIVITY AT N=40: THE CASE OF NEUTRON RICH Fe ISOTOPES

W.Rother, A.Dewald, H.Iwasaki, S.M.Lenzi, K.Starosta, D.Bazin, T.Baugher, B.A.Brown, H.L.Crawford, C.Fransen, A.Gade, T.N.Ginter, T.Glasmacher, G.F.Grinyer, M.Hackstein, G.Ilie, J.Jolie, S.McDaniel, D.Miller, P.Petkov, Th.Pissulla, A.Ratkiewicz, C.A.Ur, P.Voss, K.A.Walsh, D.Weisshaar and K.-O.Zell

**Physical Review Letters 106 (2011) 022502**

1. A.N.Deacon, D.Steppenbeck, S.Zhu, S.J.Freeman, R.V.F.Janssens RVF, M.P.Carpenter, B.Fornal, M.Honma, B.P.Kay, F.G.Kondev, J.Kozemczak, A.Larabee, T.Lauritsen, C.J.Lister, A.P.Robinson, D.Seweryniak, J.F.Smith, Y.Sun, X.Wang, F.R.Xu, and Y.C.Yang, Phys. Rev. C 83 (2011) 064305 - **[A110]**
2. G.Rainovski, DSc Thesis, Sofia University 2012 - **[A110]**
3. E.C.Simpson and J.A.Tostevin, Phys. Rev. C 86 (2012) 054603 - **[A110]**
4. A.Goergen, Physica Scripta T150 (2012) 014016 - **[A110]**
5. K.Sato, N.Hinohara, K.Yoshida, T.Nakatsukasa, M.Matsuo, and K.Matsuyanagi, Phys. Rev. C 86 (2012) 024316 - **[A110]**
6. S.Naimi, G.Audi, D.Beck, K.Blaum, C.Bohm, C.Borgmann, M.Breitenfeldt, S.George, F.Herfurth, A.Herlert, A.Kellerbauer, M.Kowalska, D.Lunney, E.M.Ramirez, D.Neidherr, M.Rosenbusch, L.Schweikhard, R.N.Wolf, and K.Zuber, Phys. Rev. C 86 (2012) 014325 - **[A110]**
7. B.Pritychenko, J.Choquette, M.Horoi, B.Karamy, and B.Singh, Atomic Data and Nuclear Data Tables 98 (2012) 798 - **[A110]**
8. L.F.Dong, J.Shang, Y.F.He, Z.G.Bai, L.Liu, and W.L.Fan, Phys. Rev. E 85 (2012) 066403 - **[A110]**
9. P.C.Srivastava, Mod. Phys. Lett. A 27 (2012) 1250061 - **[A110]**
10. A.L.Nichols, B.Singh, and J.K.Tuli, Nuclear Data Sheets 113 (2012) 973 - **[A110]**
11. S.Zhu, R.V.F.Janssens, M.P.Carpenter, C.J.Chiara, R.Broda, B.Fornal, N.Hotelting, W.Krolas, T.Lauritsen, T.Pawlat, D.Seweryniak, I.Stefanescu, J.R.Stone, W.B.Walters, X.Wang, and J.Wrzesinski, Phys. Rev. C 85 (2012) 034336 - **[A110]**
12. P.C.Srivastava and I.Mehrotra, Int. J. Mod. Phys. E-Nucl. Phys. 21 (2012) 1250007 - **[A110]**
13. D.Radulov, C.J.Chiara, I.G.Darby, H. De Witte, J.Diriken, D.V.Fedorov, V.N.Fedosseev, M.Huyse, U.Koester, B.A.Marsh, D.Pauwels, L.Popescu, M.D.Seliverstov,

- A.M.Sjodin, P. Van den Bergh, P. Van Duppen, M.Venhart, W.B.Walters, and K.Wimmer, Phys. Rev. C 88 (2013) 014307 -[**A110**]
14. P.C.Srivastava and M.J.Ermamatov, Physics of Atomic Nuclei 76 (2013) 692-701 -[**A110**]
  15. A.Bulgac and M.M.Forbes, Phys. Rev. C 87 (2013) 051301 -[**A110**]
  16. M.P.Carpenter, R.V.Janssens, and S.Zhu, Phys. Rev. C 87 (2013) 041305 -[**A110**]
  17. H.Jin, Y.Sun, K.Kaneko, and S.Tazaki, Phys. Rev. C 87 (2013) 044327 -[**A110**]
  18. A.O.Macchiavelli, Acta Physica Polonica B 44 (2013) 359-369 -[**A110**]
  19. B.Olaizola, L.M.Fraile, H.Mach, J.A.Briz, J.Cal, D.Ghita, U.Koster, W.Kurcewicz, S.Lesher, D.Pauwels, E.Picado, D.Radulov, G.Simpson, and J.M.Udias, AIP Conf. Proc. 1541 (2013) 181-182 -[**A110**]
  20. R.Broda, T.Pawlat, W.Krolas, R.V.F.Janssens, S.Zhu, W.B.Walters, B.Fornal, C.J.Chiara, M.P.Carpenter, N.Hotelting, L.W.Iskra, F.G.Kondev, T.Lauritsen, D.Seweryniak, I.Stefanescu, X.Wang, and J.Wrzesinski, Phys. Rev. C 86 (2012) 064312 -[**A110**]
  21. S.Peru, M.Martini, Eur. Phys. J. A 50 (2014) 88 -[**A110**]
  22. A.Illana, A.Jungclaus, R.Orlandi, A.Perea, C.Bauer, J.A.Briz, J.L.Egido, R.Gernhauser, J.Leske, D.Mucher, J.Pakarinen, N.Pietralla, M.Rajabali, T.R.Rodriguez, D.Seiler, C.Stahl, D.Voulot, F.Wenander, A.Blažhev, H.De Witte, P.Reiter, M.Seidlitz, B.Siebeck, M.J.Vermeulen, N.Warr, Phys. Rev. C 89 (2014) 054316 -[**A110**]
  23. L.Coraggio, A.Covello, A.Gargano, N.Itaco, Phys. Rev. C 89 (2014) 024319 -[**A110**]
  24. S.Suchyta, S.N.Liddick, Y.Tsunoda, T.Otsuka, M.B.Bennett, A.Chemey, M.Honma, N.Larson, C.J.Prokop, S.J.Quinn, N.Shimizu, A.Simon, A.Spyrou, V.Tripathi, Y.Utsuno, J.M. Von Moss, Phys. Rev. C 89 (2014) 021301 -[**A110**]
  25. A.Gargano, L.Coraggio, A.Covello, N.Itaco, Journal of Physics Conference Series 527 (2014) 012004 -[**A110**]
  26. Y.Liu, T.Gottwald, C.C.Havener, C.Mattolat, C.R.Vane, K.Wendt, Journal of Physics B-Atomic Molecular and Optical Physics 46 (2013) 245003 -[**A110**]

#### A111) LIFETIME MEASUREMENTS IN MIRROR NUCLEI $^{31}\text{S}$ AND $^{31}\text{P}$ : A TEST FOR ISOSPIN MIXING

D.Tonev, G. de Angelis, P.Petkov, S.Iliev, R.Orlandi, C.Ur, N.Goutev, M.S.Yavahchova, R.Menegazzo, D.Bazzacco, P.G.Bizzeti, A.M.Bizzeti-Sona, S.Brant, D.Bucurescu, I.Deloncle, F.Della Vedova, E.Farnea, A.Gadea, C.He, A.Iordachescu, M.Ionescu-Bujor, H.Laftchiev, S.M.Lenzi, G.Lo Bianco, S.Lunardi, N.Marginean, R.Marginean, D.Mengoni, D.R.Napoli, H.Penttilä, F.Recchia, E.Sahin, R.P.Singh, A.Saltarelli, J.J.Valiente-Dobon, H.-F.Wirth and Q.Zhong

**Journal of Physics: Conference Series 267 (2011) 012048**

1. C.Wrede, AIP Advances 4 (2014) 041004 - [A111]

A112) HALF-LIFE MEASUREMENTS OF  $^{137,139}\text{Cs}$  EXCITED NUCLEAR STATES  
B.Roussiére, M.A.Cardona, I.Deloncle, D.Hojman, J.Kiener, P.Petkov, D.Tonev,  
Ts.Venkova, and the ALTO Collaboration  
**European Physical Journal A 47 (2011) 106-119**

1. S.Kisyov, MSc Diploma Thesis, Sofia University 2012 - [A112]

A113) A NEW RECOIL DISTANCE TECHNIQUE USING LOW ENERGY  
COULOMB EXCITATION IN INVERSE KINEMATICS

W.Rother, A.Dewald, G.Pascovici, C.Fransen, G.Friessner, M.Hackstein, G.Ilie,  
H.Iwasaki, J.Jolie, B.Melon, P.Petkov, M.Pfeiffer, Th.Pissulla, K.-O.Zell, U.Jakobsson,  
R.Julin, P.Jones, S.Ketelhut, P.Nieminan, P.Peura, P.Rahkila, J.Uusitalo, C.Scholey,  
S.Harissopoulos, A.Lagoyannis, T.Konstantinopoulos, T.Grahn and D.Balabanski

**Nuclear Instruments and Methods in Physics Research A654 (2011)  
196-205**

1. J.Ljungvall, G.Georgiev, S.Cabaret, N.Karkour, D.Linget, G.Sedes, R.Chevrier,  
I.Matea, M.Niikura, M.D.Salsac, and B.Sulignano, Nucl. Instr. Meth. Phys. Res. A  
679 (2012) 61 -[A113]

2. V.Werner, G.Ilie, D.Radeck, T.Ahn, C.W.Beausang, L.Bettermann, R.J.Casperson,  
R.Chevrier, N.Cooper, T.C.Bonniwell, A.Heinz, E.Holland, D.McCarthy, B.Pauerstein,  
M.K.Smith, J.R.Terry, and E.Williams, J. Phys. Conf. Ser. 366 (2012) 012048  
-[A113]

3. P.Voss, R.Henderson, C.Andreoiu, R.Ashley, R.A.E.Austin, G.C.Ball, P.C.Bender,  
A.Bey, A.Cheeseman, A.Chester,D.S.Cross, T.E.Drake, A.B.Garnsworthy, G.Hackman,  
S.Ketelhut, P.Kowalski, R.Kruecken, A.T.Laffoley, K.G.Leach, D.Miller, W.J.Mills,  
M.Moukaddam, C.J.Pearson, J.Pore, E.T.Rand, M.M.Rajabali, U.Rizwan, J.Shoults,  
K.Starosta, C.E.Svensson, E.Tardiff, C.Unsworth, K.Van Wieren, Z.M.Wang, J.Williams,  
Nucl. Instr. Meth. Phys. Res. A 746 (2014) 87 -[A113]

4. J.L.Wang, X.G.Wu, C.Y.He, G.S.Li, Q.W.Fan, Y.H.Du, Y.H.Wu, S.P.Hu,  
Y.Zheng, C.B.Li, H.W.Li, J.J.Liu, P.W.Luo, S.H.Yao, Chinese Physics C 38 (2014)  
036201 -[A113]

A114) YRAST ELECTROMAGNETIC TRANSITION STRENGTHS AND SHAPE  
COEXISTENCE IN  $^{182}\text{Pt}$

K.A.Gladnishki, P.Petkov, A.Dewald, C.Fransen, M.Hackstein, J.Jolie, Th.Pissulla,  
W.Rother and K.O.Zell

**Nuclear Physics A 877 (2012) 19-34**

1. G.H.Bhat, J.A.Sheikh, Y.Sun, and U.Garg, Phys. Rev. C 86 (2012) 047307 -  
**[A114]**
- 2.J.C.Walpe, U.Garg, S.Naguleswaran, J.Wei, W.Reviol, I.Ahmad, M.P.Carpenter,  
and T.L.Khoo, Phys. Rev. C 85 (2012) 057302 - **[A114]**

A115) AGATA - Advanced GAMMA Tracking Array

S. Akkoyun, A. Algora, B. Alikhani, F. Ameil, G. de Angelis, L. Arnold, A. Astier, A. Ata, Y. Aubert, C. Aufranc, A. Austin, S. Aydin, F. Azaiez, S. Badoer, D.L. Balabanski, D. Barrientos, G. Baulieu, R. Baumann, D. Bazzacco, F.A. Beck, T. Beck, P. Bednarczyk, M. Bellato, M.A. Bentley, G. Benzoni, R. Berthier, L. Berti, R. Beunard, G. Lo Bianco, B. Birkenbach, P.G. Bizzeti, A.M. Bizzeti-Sona, F. Le Blanc, J.M. Blasco, N. Blasi, D. Bloor, C. Boiano, M. Borsato, D. Bortolato, A.J. Boston, H.C. Boston, P. Bourgault, P. Boutachkov, A. Bouty, A. Bracco, S. Brambilla, I.P. Brawn, A. Brondi, S. Broussard, B. Bruyneel, D. Bucurescu, I. Burrows, A. Bürger, S. Cabaret, B. Cahan, E. Calore, F. Camera, A. Capsoni, F. Carrio, G. Casati, M. Castoldi, B. Cederwall, J.-L. Cercus, V. Chambert, M. El Chambit, R. Chapman, L. Charles, J. Chavas, E. Clement, P. Cocconi, S. Coelli, P.J. Coleman-Smith, A. Colombo, S. Colosimo, C. Commeaux, D. Conventi, R.J. Cooper, A. Corsi, A. Cortesi, L. Costa, F.C.L. Crespi, J.R. Cresswell, D.M. Cullen, D. Curien, A. Czermak, D. Delbourg, R. Depalo, T. Descombes, P. Desesquelles, P. Detistov, C. Diarra, F. Didierjean, M.R. Dimmock, Q.T. Doan, C. Domingo-Pardo, M. Doncel, F. Dorangeville, N. Dosme, Y. Drouen, G. Duchene, B. Dulny, J. Eberth, P. Edelbruck, J. Egea, T. Engert, M.N. Erduran, S. Ertürk, C. Fanin, S. Fantinel, E. Farnea, T. Faul, M. Filliger, F. Filmer, Ch. Finck, G. de France, A. Gadea, W. Gast, A. Geraci, J. Gerl, R. Gernhäuser, A. Giannatiempo, A. Giaz, L. Gibelin, A. Givechev, N. Goel, V. Gonzalez, A. Gottardo, X. Grave, J. Grebosz, R. Griffiths, A.N. Grint, P. Gros, L. Guevara, M. Gulmini, A. Görgen, H.T.M. Ha, T. Habermann, L.J. Harkness, H. Harroch, K. Hauschild, C. He, A. Hernandez-Prieto, B. Hervieu, H. Hess, T. Hüyük, E. Ince, R. Isocrate, G. Jaworski, A. Johnson, J. Jolie, P. Jones, B. Jonson, P. Joshi, D.S. Judson, A. Jungclaus, M. Kaci, N. Karkour, M. Karolak, A. Kaskas, M. Kebbiri, R.S. Kempley, A. Khaplanov, S. Klupp, M. Kogimtzis, I. Kojouharov, A. Korichi, W. Korten, Th. Kröll, R. Krücken, N. Kurz, B.Y. Ky, M. Labiche, X. Lafay, L. Lavergne, I.H. Lazarus, S. Leboutelier, F. Lefebvre, E. Legay, L. Legeard, F. Lelli, S.M. Lenzi, S. Leoni, A. Lermitage, D. Lersch, J. Leske, S.C. Letts, S. Lhenoret, R.M. Lieder, D. Linget, J. Ljungvall, A. Lopez-Martens, A. Lotode, S. Lunardi, A. Maj, J. van der Marel, Y. Mariette, N. Marginean, R. Marginean, G. Maron, A.R. Mather, W.

Meczynski, V. Mendez, P. Medina, B. Melon, R. Menegazzo, D. Mengoni, E. Merchan, L. Mihailescu, C. Michelagnoli, J. Mierzejewski, L. Milechina, B. Million, K. Mitev, P. Molini, D. Montanari, S. Moon, F. Morbiducci, R. Moro, P.S. Morrall, O. Möller, A. Nannini, D.R. Napoli, L. Nelson, M. Nespolo, V.L. Ngo, M. Nicoletto, R. Nicolini, Y. Le Noa, P.J. Nolan, M. Norman, J. Nyberg, A. Obertelli, A. Olariu, R. Orlandi, D.C. Oxley, C. Özben, M. Ozille, C. Oziol, E. Pachoud, M. Palacz, J. Palin, J. Pancin, C. Parisel, P. Pariset, G. Pascovici, R. Peghin, L. Pellegrini, A. Perego, S. Perrier, M. Petcu, P. Petkov, C. Petrache, E. Pierre, N. Pietralla, S. Pietri, M. Pignanelli, I. Piqueras, Z. Podolyak, P. Le Pouhalec, J. Pouthas, D. Pugnere, V.F.E. Pucknell, A. Pullia, B. Quintana, R. Raine, G. Rainovski, L. Ramina, G. Rampazzo, G. La Rana, M. Rebeschini, F. Recchia, N. Redon, M. Reese, P. Reiter, P.H. Regan, S. Riboldi, M. Richer, M. Rigato, S. Rigby, G. Ripamonti, A.P. Robinson, J. Robin, J. Roccazz, J.-A. Ropert, B. Rosse, C. Rossi Alvarez, D. Rosso, B. Rubio, D. Rudolph, F. Saillant, E. Sahin, F. Salomon, M.-D. Salsac, J. Salt, G. Salvato, J. Sampson, E. Sanchis, C. Santos, H. Schaffner, M. Schlarb, D.P. Scraggs, D. Seddon, M. Senyigi, M.-H. Sigward, G. Simpson, J. Simpson, M. Slee, J.F. Smith, P. Sona, B. Sowicki, P. Spolaore, C. Stahl, T. Stanios, E. Stefanova, O. Stezowski, J. Strachan, G. Suliman, P.-A. Söderström, J.L. Tain, S. Tanguy, S. Tashenov, Ch. Theisen, J. Thornhill, F. Tomasi, N. Toniolo, R. Touzery, B. Travers, A. Triossi, M. Tripone, K.M.M. Tun-Lanoë, M. Turcato, C. Unsworth, C.A. Ur, J.J. Valiente-Dobon, V. Vandone, E. Vardaci, R. Venturelli, F. Veronese, Ch. Veyssiére, E. Viscione, R. Wadsworth, P.M. Walker, N. Warr, C. Weber, D. Weisshaar, D. Wells, O. Wieland, A. Wiens, G. Wittwer, H.J. Wollersheim, F. Zocca, N.V. Zamfir, M. Zieblinski, A. Zucchiatti

**Nuclear Instruments and Methods in Physics Research A 668 (2012)  
26-58**

1. M.Hackstein, Dissertation, Universität zu Köln (2013) - -[A115]
2. L.Chen, J.C.Hardy, M.Bencomo, V.Horvat, N.Nica, and H.I.Park, Nucl. Instr. Meth. Phys. Res. A 728 (2013) 81-91 -[A115]
3. M.Bruno, F.Gramegna, T.Marchi, L.Morelli, G.Pasquali, G.Casini, U.Abbondanno, G.Baiocco, L.Bardelli, S.Barlini, M.Bini, S.Carboni, M.Cinausero, M.D'Agostino, M.Degerlier, V.L.Kravchuk, E.Geraci, P.F.Mastinu, A.Ordine, S.Piantelli, G.Poggi, and A.Moroni, Eur. Phys. J. A 49 (2013) 128 -[A115]
4. A.Bulgac and M.M.Forbes, Phys. Rev. C 87 (2013) 051301 -[A115]
5. J.Gunst, A.Surzhykov, A.Artemev, S.Fritzsche, S.Tashenov, A.Maiorova, V.M.Shabaev, and T.Stohlker, Phys. Rev. A 87 (2013) 032714 -[A115]
6. A.O.Macchiaielli, Acta Physica Polonica B 44 (2013) 359-369 -[A115]
7. A.Dumitrescu, UNIVERSITY POLITEHNICA OF BUCHAREST SCIENTIFIC BULLETIN -SERIES A-APPLIED MATHEMATICS AND PHYSICS 75 (2013) 215-224 -[A115]
8. X.Wang and M.A.Riley, AIP Conf. Proc. 1498 (2012) 84-96 -[A115]

9. A.L.Nichols, Radiochimica Acta 100 Issue: 8-9 Special Issue: SI (2012) 615-634 -[A115]

A116) DEVELOPING THE RECOIL DISTANCE DOPPLER-SHIFT TECHNIQUE TOWARDS A VERSATILE TOOL FOR LIFETIME MEASUREMENTS OF EXCITED NUCLEAR STATES

A.Dewald, O.Möller and P.Petkov

Progress in Particle and Nuclear Physics 67 (2012) 786-839

1. M.Hackstein, Dissertation, Universität zu Köln (2013) --[A116]
2. A.Bulgac and M.M.Forbes, Phys. Rev. C 87 (2013) 051301 -[A116]
3. Z.Kohley, T.Baumann, D.Bazin, G.Christian, P.A.DeYoung, J.E.Finck, N.Frank, M.Jones, E.Lunderberg, B.Luther, S.Mosby, T.Nagi, J.K.Smith, J.Snyder, A.Spyrou, and M.Thoennessen, Phys. Rev. Lett. 110 (2013) 152501 -[A116]
4. H.Iwasaki, AIP Conf. Proc. 1525 (2013) 581-585 -[A116]
5. D.Radeck, Dissertation, Universität zu Köln (2013) --[A116]
6. T.Pissulla, Dissertation, Universität zu Köln (2014) --[A116]
7. C.K.Gupta, A.Rohilla, S.R.Abhilash, D.Kabiraj, R.P.Singh, D.Mehta, S.K.Chamoli, Nucl. Instr. Meth. Phys. Res. A 764 (2014) 273 -[A116]
8. A.Goasduff, J.J.Valiente-Dobon, S.Lunardi, F.Haas, A.Gadea, G. de Angelis, D.Bazzacco, S.Courtin, E.Farnea, A.Gottardo, C.Michelagnoli, D.Mengoni, D.R.Napoli, F.Recchia, E.Sahin, C.A.Ur, Nucl. Instr. Meth. Phys. Res. A 758 (2014) 1 -[A116]
9. P.Voss, R.Henderson, C.Andreoiu, R.Ashley, R.A.E.Austin, G.C.Ball, P.C.Bender, A.Bey, A.Cheeseman, A.Chester, D.S.Cross, T.E.Drake, A.B.Garnsworthy, G.Hackman, R.Holland, S.Ketelhut, P.Kowalski, R.Kruecken, A.T.Laffoley, K.G.Leach, D.Miller, W.J.Mills, M.Moukaddam, C.J.Pearson, J.Pore, E.T.Rand, M.M.Rajabali, U.Rizwan, J.Shoults, K.Starosta, C.E.Svensson, E.Tardiff, C.Unsworth, K.Van Wieren, Z.M.Wang, J.Williams, Nucl. Instr. Meth. Phys. Res. A 746 (2014) 87 -[A116]
10. J.L.Wang, X.G.Wu, C.Y.He, G.S.Li, Q.W.Fan, Y.H.Du, Y.H.Wu, S.P.Hu, Y.Zheng, C.B.Li, H.W.Li, J.J.Liu, P.W.Luo, S.H.Yao, Chinese Physics C 38 (2014) 036201 -[A116]
11. C.Plaisir, L.Gaudefroy, V.Meot, A.Blanc, J.M.Daugas, O.Roig, N.Arnal, T.Bonnet, F.Gobet, F.Hannachi, M.Tarisien, M.Versteegen, T.Roger, M.Rejmund, A.Navin, C.Schmitt, G.Fremont, J.Goupil, J.Pancin, C.Spitaels, M.Zielinska, Phys. Rev. C 89 (2014) 021302 -[A116]
12. P.G.Bizzeti, A.M.Bizzeti-Sona, Nucl. Instr. Meth. Phys. Res. A 736 (2014) 179 -[A116]
13. A.Bulgac, M.M.Forbes, Phys. Rev. C 87 (2013) 051301 -[A116]
14. Z.Kohley, T.Baumann, D.Bazin, G.Christian, P.A.DeYoung, J.E.Finck, N.Frank,

M.Jones, E.Lunderberg, B.Luther, S.Mosby, T.Nagi, J.K.Smith, J.Snyder, A.Spyrou, M.Thoennessen, Phys. Rev. Lett. 110 (2013) 152501 -[A116]

A117) SEARCH FOR ONE-PHONON MIXED-SYMMETRY STATES IN THE RADIOACTIVE NUCLEUS  $^{140}\text{Nd}$

K.A.Gladniski, G.Rainovski, P.Petkov, J.Jolie, N.Pietralla, A.Blažhev, A.Damyanova, M.Danchev, A.Dewald, C.Fransen, M.Hackstein, O.Möller, T.Pissulla, M.Reese and W.Rother

**Journal of Physics: Conference Series 366 (2012) 012020**

A118) LEVEL SCHEME INVESTIGATION OF  $^{102}\text{Rh}$

N.Goutev, M.S.Yavahchova, D.Tonev, G. de Angelis, P.Petkov, R.K.Bhowmik, R.P.Singh, S.Muralithar, N.Madhavan, R.Kumar, M.Kumar Raju, J.Kaur, G.Mahanto, A.Singh, N.Kaur, R.Garg, A.Sukla, Ts.K.Marinov and S.Brant

**Journal of Physics: Conference Series 366 (2012) 012021**

A119)  $^{182}\text{Pt}$  AS A POSSIBLE CANDIDATE FOR X(5) SYMMETRY

P.Petkov, K.A.Gladnsihki, A.Dewald, C.Fransen, M.Hackstein, J.Jolie, Th.Pissulla, W.Rother and K.O.Zell

**Journal of Physics: Conference Series 366 (2012) 012036**

1. A.Raduta, P.Buganu, Phys. Rev. C 88 (2013) 064328 -[A119]

A120) FAST-TIMING MEASUREMENTS PERFORMED AT ALTO ON  $^{137,139}\text{Cs}$

B.Roussiére, M.A.Cardona, I.Deloncle, D.Hojman, J.Kiener, P.Petkov, D.Toneva Ts.Venkova and the ALTO collaboration

**Journal of Physics: Conference Series 366 (2012) 012038**

A121) ELECTROMAGNETIC TRANSITION STRENGTHS IN  $^{155}\text{Dy}$

M.S.Yavahchova, P.Petkov, A.Dewald, O.Möller, B.Saha, A.Fitzler, K.Jessen,

D.Tonev, N.Gutev, T.Klug, S.Heinze, J.Jolie, P. von Brentano, D.Bazzacco, C.A.Ur,  
E.Farnea, M.Axiotis, S.Lunardi, C.Rossi-Alvarez, G. de Angelis, D.R.Napoli, N.Marginean,  
T.Martinez and M.Caprio

**Journal of Physics: Conference Series 366 (2012) 012050**

A122) CHECK FOR CHIRALITY IN  $^{102}\text{Rh}$

D. Tonev, N. Goutev, M.S. Yavahchova, P. Petkov, G. de Angelis, R.K. Bhowmik,  
R.P. Singh, S. Muralithar, N. Madhavan, R. Kumar, M. Kumar Raju, J. Kaur, G.  
Mahanto, A. Singh, N. Kaur, R. Garg, A. Sukla, Ts.K. Marinov, and S. Brant

**American Institute of Physics Conf. Proc. 1491 (2012) 166**

A123) STUDY OF VIBRATIONAL SIGNATURES IN  $^{102}\text{Ru}$

H.Duckwitz, M.Pfeiffer, M.Albers, C.Bernards, C.Fransen, J.Jolie, P.Petkov, D.Radeck,  
T.Thomas and K.O.Zell

**Nuclear Physics A 903 (2013) 18-39**

1. Da-Li Zhang, Shu-Qing, Bin-Gang Ding, Chinese Physics Letters 31 (2014)  
072101 - [A123]

A124) A NEW VERSION OF THE DIFFERENTIAL DECAY CURVE METHOD  
FOR DOPPLER-SHIFT ATTENUATION LIFETIME MEASUREMENTS

P.Petkov, M.Yavahchova, D.Tonev, N.Goutev and A.Dewald

**Nuclear Instruments and Methods in Physics Research A 711 (2013)  
96-100**

A125) PLUNGER LIFETIMES AND ELECTROMAGNETIC TRANSITION STRENGTHS  
IN ODD  $^{167}\text{Yb}$

K.A.Gladnishki, P.Petkov, A.Dewald, O.Möller, I.Deloncle, D.Tonev, M.Reese,  
C.Fransen, M.Hackstein, J.Jolie, Th.Pissulla, W.Rother, and K.O.Zell

**Nuclear Physics A 903 (2013) 1-17**

A126) CENTRIFUGAL STRETCHING FROM LIFETIME MEASUREMENTS  
IN THE  $^{170}\text{Hf}$  GROUND STATE BAND

M.K.Smith, V.Werner, J.R.Terry, N.Pietralla, P.Petkov, Z.Berant, R.J.Casperson,

A.Heinz, G.Henning, R.Luttke, J.Qian, B.Shoraka, G.Rainovski, E.Williams, R.Winkler  
**Physical Review C 87 (2013) 044317**

**A127) SUBMICROSECOND ISOMER IN  $^{117}_{45}\text{Rh}_{72}$  AND THE ROLE OF TRIAXIALITY IN ITS ELECTROMAGNETIC DECAY RATE**

S.Lalkovski, A.M.Bruce, A.M. Denis Bacelar, M.Gorska, S.Pietri, Zs.Podolyak, P.Bednarczyk, L.Caceres, E.Casarejos, I.J.Cullen, P.Doornenbal, G.F.Farrelly, A.B.Garnsworthy, H.Geissel, W.Gelletly, J.Gerl, J.Grebosz, C.Hinke, G.Ilie, D.Ivanova, G.Jaworski, S.Kisyov, I.Kojouharov, N.Kurz, N.Minkov, S.Myalski, M.Palacz, P.Petkov, W.Prokopowicz, P.H.Regan, H.Schaffner, S.Steer, S.Tashenov, P.M.Walker, and H.J.Wollersheim

**Physical Review C 88 (2013) 024302**

**A128) LIFETIMES AND ELECTROMAGNETIC TRANSITION STRENGTHS IN  $^{155}\text{Dy}$**

P.Petkov, M.S.Yavahchova, O.Möller, A. Dewald, D.Tonev, B.Saha, A.Fitzler, K.Jessen, T.Klug, S.Heinze, J.Jolie, P. von Brentano, N.Goutev, D.Bazzacco, C.A.Ur, E.Farnea, M.Axiotis, S.Lunardi, G. de Angelis, D.R.Napoli, N.Marginean, T.Martinez, and M.A.Caprio

**Physical Review C 88 (2013) 034323**

**A129) EVIDENCE FOR SHAPE COEXISTENCE IN  $^{98}\text{Mo}$**

T.Thomas, K.Nomura, V.Werner, T.Ahn, N.Cooper, H.Duckwitz, M.Hinton, G.Ilie, J.Jolie, P.Petkov, and D.Radeck

**Physical Review C 88 (2013) 044305**

1. J.Henderson, D.G.Jenkins, P.J.Davies, M.Alcorta, M.P.Carpenter, B.P.Kay, C.J.Lister, S.Zhu, Phys. Rev. C 89 (2014) 064307 - [A129]

---

**Total of 839 citations, H-factor = 22 (Web of Science)**