

## PUBLICATIONS

1. Gauge quantization for spin 3/2 fields, A. Das and D. Z. Freedman, Nuclear Physics **B114**, 271 (1976).
2. Gauge internal symmetry in extended supergravity, A. Das and D. Z. Freedman, Nuclear Physics **B120**, 221 (1977).
3. SO(4) invariant extended supergravity, A. Das, Physical Review **D15**, 2805 (1977).
4. Massive, self-interacting scalar multiplet coupled to supergravity, A. Das, M. Fischler and M. Roček, Physics Letters **69B**, 186 (1977).
5. Super Higgs effect in a class of scalar models and a model of super QED, A. Das, M. Fischler and M. Roček, Physical Review **D16**, 3427 (1977).
6. Stress tensor in a class of gauge theories, A. Das, Physical Review **D18**, 2065 (1978).
7. A unified approach to matter coupling in Weyl and Einstein supergravity, A. Das, M. Kaku and P. Townsend, Physical Review Letters **40**, 1215 (1978).
8. Supersymmetry at high temperatures, A. Das and M. Kaku, Physical Review **D18**, 4540 (1978).
9. Gauge fixing ambiguities, flux strings and the unconstrained Yang Mills theory, A. Das, M. Kaku and P. Townsend, Nuclear Physics **B149**, 109 (1979).
10. Lattice formulation of general relativity, A. Das, M. Kaku and P. Townsend, Physics Letters **81B**, 11 (1979).
11. Observations on the Gribov ambiguity in general relativity in the Coulomb gauge, A. Das and M. Kaku, Nuovo Cimento **50B**, 303 (1979).
12. New renormalization program for broken gauge theories, N. P. Chang, A. Das and J. Perez-Mercader, Physical Review **D22**, 1414 (1980).
13. Asymptotically free, one-coupling-constant, one-mass-scale SU(5) model, N. P. Chang, A. Das and J. Perez-Mercader, Physical Review **D22**, 1429 (1980).
14. Proton stability in an asymptotically free SU(5) model, N. P. Chang, A. Das and J. Perez-Mercader, Physics Letters **93B**, 137 (1980).
15. An asymptotically free SU(5) model with three generations, N. P. Chang, A. Das and J. Perez-Mercader, Physical Review **D22**, 1829 (1980).
16. Proton decay, N. P. Chang, A. Das and J. Perez-Mercader, Physical Review **D23**, 132 (1981).

17. Quadratic gauge fixing in Yang Mills theories, A. Das and M. A. Namazie, *Physics Letters* **99B**, 463 (1981).
18. Nontrivial quadratic gauge fixing in Yang Mills theories, A. Das, *Pramana* **16**, 409 (1981).
19. Decoupling and low energy BRS, N. P. Chang, A. Das, D. X. Li, D. C. Xian, and X. J. Zhou, *Physical Review* **D25**, 1630 (1982).
20. Systematic expansion for compact QED near weak coupling, J. B. Bronzan and A. Das, *Physical Review* **D26**, 1415 (1982).
21. Nonlinear gauge fixing with auxiliary fields, A. Das, *Physical Review* **D26**, 2774 (1982).
22. A new test for spontaneous breakdown of supersymmetry, C. M. Bender, F. Cooper and A. Das, *Physical Review* **D28**, 1473 (1983).
23. Continuum limit of supersymmetric field theories on a lattice, C. M. Bender, F. Cooper and A. Das, *Physical Review Letters* **50**, 397 (1983).
24. Strong coupling approximation in supersymmetric field theory, C. M. Bender, A. Das, H. Lim, L. M. Simmons, Jr., *Physics Letters* **134B**, 225 (1984).
25. On higher order computations in strong coupling, C. M. Bender, A. Das and H. Lim, *Pramana* **23**, 695 (1984).
26. High-order strong-coupling calculation of the ground-state energy density in supersymmetric field theory, C. M. Bender, P. H. Burchard, A. Das, H. A. Lim and J. A. Shapiro, *Physical Review Letters* **54**, 2481 (1985).
27. Strong-coupling calculation of mass ratio in supersymmetric field theory, C. M. Bender, A. Das, H. A. Lim and L. M. Simmons, Jr., *Physics Letters* **154B**, 381 (1985).
28. Current definition freedom in a derivative coupling model, A. Das and C. R. Hagen, *Physical Review* **D32**, 2024 (1985).
29. The Chiral Schwinger Model, A. Das, *Physical Review Letters* **55**, 2126 (1985).
30. Path integral solubility of two dimensional models, A. Das and V. S. Mathur, *Physical Review* **D33**, 489 (1986).
31. Algebra of charges in the supersymmetric nonlinear  $\sigma$  model, J. Barcelos-Neto, A. Das and J. Maharana, *Zeitschrift für Physik* **C30**, 401 (1986).
32. Dirac quantization in superspace, J. Barcelos-Neto and A. Das, *Physical Review* **D33**, 2863 (1986).

33. Path integrals and the solution of Schwinger model in curved space-time, J. Barcelos-Neto and A. Das, Physical Review **D33**, 2262 (1986).
34. Dirac quantization of the chiral superfield, J. Barcelos-Neto, A. Das and W. Scherer, Physical Review **D34**, 1108 (1986).
35. Chiral Schwinger model in curved space-time, J. Barcelos-Neto and A. Das, Zeitschrift für Physik **C32**, 527 (1986).
36. The Witten index at finite temperature, A. Das, A. Kharev and V. S. Mathur, Physics Letters **B181**, 299 (1986).
37. Absence of anomaly in the compactified superstring theory in every even lower dimension, A. Das and Y. Kwon, Physical Review **D35**, 1508 (1987).
38. Observations on Nicolai map at finite temperature, A. Das and V. S. Mathur, Physical Review **D35**, 2053 (1987).
39. Canonical quantization of constrained systems, J. Barcelos-Neto, A. Das and W. Scherer, Acta Physica Polonica **B18**, 269 (1987).
40. QCD sum-rules and vector-meson masses and widths, A. Das, V. S. Mathur and P. Panigrahi, Physical Review **D35**, 2178 (1987).
41. Supersymmetry breaking at finite temperature, A. Das and V. S. Mathur, Indian Journal of Physics **61B**, 214 (1987).
42. Quark mixing at finite temperature, K. S. Babu, A. Das and P. Panigrahi, Physics Letters **B188**, 133 (1987).
43. The derivative expansion and the anomaly at finite temperature, A. Das and A. Karev, Physical Review **D36**, 623 (1987).
44. The derivative expansion and the solubility of two dimensional models, A. Das and A. Karev, Physical Review **D36**, 2591 (1987).
45. Equivalence of Dirac quantization and Schwinger's action principle quantization, A. Das and W. Scherer, Zeitschrift für Physik **C35**, 527 (1987).
46. Nilpotency of  $Q_{BRST}$  and background field equations, A. Das and S. Roy, Zeitschrift für Physik **C36**, 317 (1987).
47. String loop effect on the BRST charge, A. Das and H. Nishino, Physics Letters **B197**, 342 (1987).
48. Derivative expansion and the induced Chern-Simons term at finite temperature in 2+1 dimensions, K. S. Babu, A. Das and P. Panigrahi, Physical Review **D36**, 3725 (1987).

49. Thermo field dynamics and para statistical mechanics, S. N. Biswas and A. Das, Modern Physics Letters **A3**, 549 (1988).
50. Path integral derivation of the Chern-Simons terms in string theories, A. Das, J. Maharana, and P. Panigrahi, Modern Physics Letters **A3**, 759 (1988).
51. Nilpotency of  $Q_{BRST}$  and the vanishing  $\beta$ -function in string theories, A. Das, Physics Letters **B205**, 49 (1988).
52. On the “current” algebra of the KdV equation, A. Das, Physics Letters **B207**, 429 (1988).
53. The integrability condition for dynamical systems, A. Das and S. Okubo, Physics Letters **B209**, 311 (1988).
54. A systematic study of the Toda lattice, A. Das and S. Okubo, Annals of Physics **190**, 215 (1989).
55. Supersymmetry and finite temperature, A. Das, Physica **A158**, 1 (1989).
56. BRST quantization of superstrings in backgrounds, A. Das, J. Maharana and S. Roy, Physical Review **D40**, 4037 (1989).
57. Chern-Simons terms in four dimensional heterotic string theory, A. Das, J. Maharana and S. Roy, Physical Review **D40**, 2636 (1989).
58. The Neveu-Schwarz-Ramond string in background fields: Nilpotency of BRST charge, A. Das, J. Maharana and S. Roy, Nuclear Physics **B331**, 573 (1990).
59. Wormhole solution in coupled Yang-Mills axion system, A. Das and J. Maharana, Physical Review **D41**, 699 (1990).
60. A simple Lagrangian for integrable systems, A. Das and M. A. de Almeida da Silva, Journal of Mathematical Physics **31**, 798 (1990).
61. Observation on the path integral derivation of the anomaly, J. Barcelos-Neto and A. Das, Modern Physics Letters **A5**, 2573 (1990).
62. The zero curvature formulation of the sKdV equations, A. Das and S. Roy, Journal of Mathematical Physics **31**, 2145 (1990).
63. Propagators for shape invariant potentials, A. Das and W. J. Huang, Physical Review **D41**, 3241 (1990).
64. An alternate characterization of integrability, A. Das and W. J. Huang, Journal of Mathematical Physics **31**, 2603 (1990).

65. The origin of  $Q_{BRST}$  in integrable models, A. Das, Modern Physics Letters **A5**, 1941 (1990).
66. Integrable models and spin algebras, A. Das and S. Roy, International Journal of Modern Physics **A6**, 1429 (1991).
67. The zero curvature formulation of the Boussinesq equation, A. Das, W. J. Huang and S. Roy, Physics Letters **A153**, 186 (1991).
68. Covariant Lax operators and Kac-Moody algebras, A. Das and S. Roy, Journal of Mathematical Physics **32**, 869 (1991).
69. The supersymmetric Boussinesq equation, A. Das, W. J. Huang and S. Roy, Physics Letters **A157**, 113 (1991).
70. A geometrical formulation of fermionic integrable systems, A. Das, W. J. Huang and S. Roy, Journal of Mathematical Physics **32**, 2733 (1991).
71. Generalized Schwinger model and a theory of interacting photons and Majorana fermions, P. F. Bedaque, A. Das and W. J. Huang, Physical Review **D44**, 1818 (1991).
72. The Hamiltonian structures of the KP hierarchy, A. Das, W. J. Huang and S. Panda, Physics Letters **B271**, 109 (1991).
73. Zero curvature condition and 2-d gravity theories, A. Das, W. J. Huang and S. Roy, International Journal of Modern Physics **A7**, 3447 (1992).
74. Zero curvature condition of  $OSp(2/2)$  and the associated supergravity theory, A. Das, W. J. Huang and S. Roy, International Journal of Modern Physics **A7**, 4293 (1992).
75. Temperature dependent anomalous statistics, A. Das and S. Panda, Journal of Physics **A25**, L245 (1992).
76. On the zero momentum limit of Feynman amplitudes at finite temperature, P. F. Bedaque and A. Das, Physical Review **D45**, 2906 (1992).
77. The super  $W_\infty$  symmetry of the Manin-Radul super KP hierarchy, A. Das, E. Sezgin and S. J. Sin, Physics Letters **B277**, 435 (1992).
78. The Hamiltonian structures associated with a generalized Lax operator, A. Das and W. J. Huang, Journal of Mathematical Physics **33**, 2487 (1992).
79. A note on supersymmetric Gelfand-Dikii brackets, A. Das and W. J. Huang, Modern Physics Letters **A7**, 2159 (1992).
80. On the bi-Hamiltonian structures of the sKdV, J. Barcelos-Neto and A. Das, Journal of Mathematical Physics **33**, 2743 (1992).

81. The zero curvature formulation of the KP and the sKP equations, J. Barcelos-Neto, A. Das, S. Panda and S. Roy, *Physics Letters* **B282**, 365 (1992).
82. Self-duality in 3+3 dimensions and the KP equation, A. Das, E. Sezgin and Z. Khvienia, *Physics Letters* **B289**, 347 (1992).
83. Self-duality and the KdV hierarchy, A. Das and C. A. P. Galvão, *Modern Physics Letters* **A8**, 647 (1993).
84. Feynman parametrization and the degenerate electron gas, P. F. Bedaque and A. Das, *Physical Review* **D47**, 601 (1993).
85. Self-duality and the supersymmetric KdV hierarchy, A. Das and C. A. P. Galvão, *Modern Physics Letters* **A8**, 1399 (1993).
86. On the analytic structure of the self-energy for massive gauge bosons at finite temperature, P. Arnold, A. Das, S. Vokos, P. Bedaque, *Physical Review* **D47**, 498 (1993).
87. Nonleptonic decays of charmed mesons into two pseudoscalar mesons, A. Das and V. S. Mathur, *Modern Physics Letters* **A8**, 2079 (1993).
88. Out of equilibrium phase transitions and a toy model for disoriented chiral condensates, P. F. Bedaque and A. Das, *Modern Physics Letters* **A8**, 3151 (1993).
89. Two body nonleptonic decays of charmed mesons, P. F. Bedaque, A. Das and V. S. Mathur, *Physical Review* **D49**, 269 (1994).
90. Annihilation diagrams in two-body nonleptonic decays of charmed mesons, P. F. Bedaque, A. Das and V. S. Mathur, *Physical Review* **D49**, 1339 (1994).
91. More on symmetries in heavy quark effective theory, A. Das and V. S. Mathur, *Physical Review* **D49**, 2508 (1994).
92. On the higher order corrections to heavy quark effective theory, A. Das, *Modern Physics Letters* **A9**, 341 (1994).
93. Davey-Stewartson equation from a zero curvature and a self-duality condition, J. C. Brunelli and A. Das, *Modern Physics Letters* **A9**, 1267 (1994).
94. Duality of the superstring in superspace, A. Das and J. Maharana, *Modern Physics Letters* **A9**, 1361 (1994).
95. Chiral invariance of massive fermions, A. Das and M. Hott, *Modern Physics Letters* **A9**, 2217 (1994).
96. Gelfand-Dikii brackets for nonstandard Lax equations, J. C. Brunelli, A. Das and W. J. Huang, *Modern Physics Letters* **A9**, 2147 (1994).

97. On the Ward identities at finite temperature, A. Das and M. Hott, *Modern Physics Letters* **A9**, 3383 (1994).
98. The supersymmetric two boson hierarchies, J. C. Brunelli and A. Das, *Physics Letters* **B337**, 303 (1994).
99. On the derivative expansion at finite temperature, A. Das and M. Hott, *Physical Review* **D50**, 6655 (1994).
100. A note on Abelian conversion of constraints, Ricardo Amorim and A. Das, *Modern Physics Letters* **A9**, 3543 (1994).
101. A new class of supersymmetric theories, A. Das, “A Gift for Prophecy”, a memorial volume for R. E. Marshak, ed. E. C. G. Sudarshan (1994).
102. Pole dominance and the two-body nonleptonic decays of charmed mesons, A. Das and V.S. Mathur, “A Gift for Prophecy”, a memorial volume for R. E. Marshak, ed. E. C. G. Sudarshan (1994).
103. Tests of integrability of the supersymmetric nonlinear Schrödinger equation, J. C. Brunelli and A. Das, *Journal of Mathematical Physics* **36**, 268 (1995).
104. Path integral solubility of a general two-dimensional model, A. Das and M. Hott, *Zeitschrift für Physik* **C67**, 707 (1995).
105. A superspace formulation of the BV action, N. R. F. Braga and A. Das, *Nuclear Physics* **B442**, 655 (1995).
106. Properties of an alternate Lax description of the KdV hierarchy, J. C. Brunelli and A. Das, *Modern Physics Letters* **A10**, 931 (1995).
107. Supersymmetric theories on a nonsimply connected space-time, A. Das and M. Hott, *Modern Physics Letters* **A10**, 893 (1995).
108. Properties of nonlocal charges in the supersymmetric two boson hierarchy, J. C. Brunelli and A. Das, *Physics Letters* **B354**, 307 (1995).
109. Bi-Hamiltonian structure of the supersymmetric nonlinear Schrödinger equation, J. C. Brunelli and A. Das, *Modern Physics Letters* **A10**, 2019 (1995).
110. Supersymmetric two boson system, its reductions and the nonstandard super KP hierarchy, J. C. Brunelli and A. Das, *International Journal of Modern Physics* **A10**, 4563 (1995).
111. A nonstandard supersymmetric KP hierarchy, J. C. Brunelli and A. Das, *Reviews in Mathematical Physics* **7**, 1181 (1995).

112. Two dimensional supersymmetric harmonic oscillator carrying a representation of the  $GL(2|1)$  graded Lie algebra, A. Das and C. Wotzasek, *Journal of Mathematical Physics* **37**, 61 (1996).
113. Thermal effects on catalysis by a magnetic field, A. Das and M. Hott, *Physical Review* **D53**, 2252 (1996).
114. Gelfand-Dikii brackets for nonstandard supersymmetric systems, A. Das and S. Panda, *Modern Physics Letters* **A11**, 723 (1996).
115. The zero curvature formulation of TB, sTB hierarchy and topological algebras, A. Das and S. Roy, *Modern Physics Letters* **A11**, 1317 (1996).
116. Soldering chiralities, R. Amorim, A. Das and C. Wotzasek, *Physical Review* **D53**, 5810 (1996).
117. A two Higgs doublet model for the top quark, A. Das and C. Kao, *Physics Letters* **B372**, 106 (1996).
118. Unidexterous versus ambidexterous gravities, R. Amorim and A. Das, *Physical Review* **D54**, 4177 (1996).
119. On M-theory and the symmetries of type II string effective actions, A. Das and S. Roy, *Nuclear Physics* **B482**, 119 (1996).
120. Higher dimensional SUSY quantum mechanics, A. Das, S. Okubo and S. Pernice, *Modern Physics Letters* **A12**, 581 (1997).
121. Simple cutting rules for the closed time path formalism, P. F. Bedaque, A. Das and S. Naik, *Modern Physics Letters* **A12**, 2481 (1997).
122. The electric dipole moment of the muon in a two Higgs doublet model, V. Barger, A. Das and C. Kao, *Physical Review* **D55**, 7099 (1997).
123. “Induced” super-symmetry breaking with a vanishing cosmological constant, A. Das and S. Pernice, *Nuclear Physics* **B505**, 123 (1997).
124. Zero curvature formalism for supersymmetric integrable hierarchies in superspace, H. Aratyn, A. Das and C. Rasinariu, *Modern Physics Letters* **A12**, 2623 (1997).
125. The sTB-B hierarchy, J.C. Brunelli and A. Das, *Physics Letters* **B409**, 229 (1997).
126. The supersymmetric two boson hierarchy, J. C. Brunelli and A. Das, “Field Theory, Integrable Systems and Symmetries”, ed F. Khanna and L. Vinet (1997).
127. A Lax description for polytropic gas dynamics, J. C. Brunelli and A. Das, *Physics Letters* **A235**, 597 (1997).



128. Integrable models and the higher dimensional representations of graded Lie algebras, J. C. Brunelli and A. Das, *Modern Physics Letters* **A13**, 133 (1998).
129. Supersymmetry and the chiral Schwinger model, R. Amorim and A. Das, *Physical Review* **D57**, 2599 (1998).
130. Finite temperature perturbation theory and large gauge invariance, A. Das and G. Dunne, *Physical Review* **D57**, 5023 (1998).
131. A Lax representation for the Born-Infeld equation, J. C. Brunelli and A. Das, *Physics Letters* **B426**, 57 (1998).
132. An  $SL(2, \mathbb{Z})$  multiplet of black holes in  $d = 4$  type II superstring theory, A. Das, J. Maharana and S. Roy, *Physics Letters* **B421**, 185 (1998).
133. Light front Hamiltonian structures for the nonlinear sigma model, A. Das, *Modern Physics Letters* **A13**, 1133 (1998).
134. The sAKNS hierarchy, H. Aratyn and A. Das, *Modern Physics Letters* **A13**, 1185 (1998).
135. Zero curvature formalism in superspace, H. Aratyn, A. Das, C. Rasinariu and A. H. Zimerman, *Lecture Notes in Physics* **502**, 213 (1998).
136. Nonlocal charges and their algebra in topological field theory, J. C. Brunelli and A. Das, *Physics Letters* **B438**, 99 (1998).
137. Derivative expansion and large gauge invariance at finite temperature, J. Barcelos-Neto and A. Das, *Physical Review* **D58**, 085022 (1998).
138. Retarded Greens functions and forward scattering amplitudes in thermal field theory, F. T. Brandt, A. Das, J. Frenkel and A. J. da Silva, *Physical Review* **D59**, 065004 (1999).
139. Effective actions for  $0 + 1$  dimensional scalar QED and its supersymmetric generalization, J. Barcelos-Neto and A. Das, *Physical Review* **D59**, 087701 (1999).
140. A soluble theory of massless scalar  $QED_2$ , F. T. Brandt, A. Das and J. Frenkel, *Physical Review* **D59**, 067701 (1999).
141. Exact effective action for  $((1 + 1)$  dimensional) fermions in an Abelian background at finite temperature, A. Das and A. J. da Silva, *Physical Review* **D59**, 105011 (1999).
142. Retarded thermal Greens functions and forward scattering amplitudes at two loops, F. T. Brandt, A. Das and J. Frenkel, *Physical Review* **D60**, 105008 (1999).
143. Supersymmetry and singular potentials, A. Das and S. A. Pernice, *Nuclear Physics* **B561**, 357 (1999).

144. Non-static dimensional reduction of  $QED_3$  at finite temperature, A. Das and G. Dunne, Physical Review **D60**, 085010 (1999).
145. Topics in finite temperature field theory, A. Das in, “Quantum Field Theory - a Twentieth Century Profile”, Indian National Science Academy (2000).
146. On neutrino masses and mixings from extra dimensions, A. Das and Otto C. W. Kong, Physics Letters **B470**, 149 (2000).
147. Dispersionless fermionic KdV, J. Barcelos-Neto, A. Constandache and A. Das, Physics Letters **A268**, 342 (2000).
148. Large gauge Ward identity, A. Das, G. Dunne and J. Frenkel, Physics Letters **B472**, 332 (2000).
149. Dispersionless sTB, A. Das and Z. Popowicz, Physics Letters **A272**, 65 (2000).
150. New nonlocal charges in susy integrable models, A. Das and Z. Popowicz, Physics Letters **A274**, 30 (2000).
151. Parity-violating electromagnetic interactions in  $QED_3$  at finite temperature, F. T. Brandt, A. Das and J. Frenkel, Physical Review **D62**, 085012 (2000).
152. Two-loop corrections to the topological mass term in thermal  $QED_3$ , F. T. Brandt, A. Das, J. Frenkel and K. Rao, Physics Letters **B492**, 393 (2000).
153. Behavior of the thermal gluon self-energy in the Coulomb gauge, F. T. Brandt, A. Das and J. Frenkel, Physical Review **D62**, 127702 (2000).
154. Absence of higher order corrections to the non-Abelian Chern-Simons coefficient, F. T. Brandt, A. Das and J. Frenkel, Physics Letters **B494**, 339 (2000).
155. Absence of higher order corrections to the non-Abelian topological mass, F. T. Brandt, A. Das and J. Frenkel, Physical Review **D63**, 085015 (2001).
156. Properties of Moyal-Lax representation, A. Das and Z. Popowicz, Physics Letters **B510**, 264 (2001).
157. Absence of higher order corrections to noncommutative Chern-Simons coupling, A. Das and M. M. Sheikh-Jabbari, Journal of High Energy Physics (JHEP) **06**, 028 (2001).
158. Derivative expansion and the effective action for the Abelian Chern-Simons theory at higher orders, F. T. Brandt, A. Das, J. Frenkel and J. C. Taylor, Physical Review **D64**, 065018 (2001).
159. Open membranes, p-branes and noncommutativity of boundary string coordinates, A. Das, J. Maharana and A. Melikyan, Journal of High Energy Physics (JHEP) **04**, 016 (2001).

160. Supersymmetric Moyal-Lax representation, A. Das and Z. Popowicz, *Journal of Physics* **A34**, 6105 (2001).
161. Colliding string waves and duality, A. Das, J. Maharana and A. Melikyan, *Physics Letters* **B518**, 306 (2001).
162. Induced parity violating thermal effective action for 2 + 1 dimensional fermions interacting with a non-Abelian background, F. T. Brandt, A. Das and J. Frenkel, *Physical Review* **D65**, 065013 (2002).
163. Supersymmetric polytropic gas dynamics, A. Das and Z. Popowicz, *Physics Letters* **A296**, 15 (2002).
164. Lucas polynomials and a standard Lax representation for polytropic gas dynamics, A. Constandache, A. Das and F. Toppan, *Letters in Mathematical Physics* **60**, 197 (2002).
165. Parity violating bosonic loops at finite temperature, V. S. Alves, A. Das, G. V. Dunne and S. Perez, *Physical Review* **D65**, 085011 (2002).
166. Non-Abelian thermal large gauge transformations in 2 + 1 dimensions, F. T. Brandt, A. Das, G. Dunne, J. Frenkel and J. C. Taylor, *Physical Review* **D65**, 065006 (2002).
167. Duality and integrability of two dimensional string effective action, A. Das, J. Maharana and A. Melikyan, *Physics Letters* **B533**, 146 (2002).
168. Kronecker delta energy terms in thermal field theory, F. T. Brandt, A. Das, J. Frenkel and J. C. Taylor, *Physical Review* **D65**, 085008 (2002).
169. General structure of the photon self-energy in non-commutative QED, F. T. Brandt, A. Das and J. Frenkel, *Physical Review* **D65**, 085017 (2002).
170. Screening length in 2 + 1 dimensional Chern-Simons theories, V. S. Alves, A. Das and Silvana Perez, *Physics Letters* **B531**, 289 (2002).
171. Duality, monodromy and integrability of two dimensional string effective action, A. Das, J. Maharana and A. Melikyan, *Physical Review* **D65**, 126001 (2002).
172. A systematic study of the radion in the Randall-Sundrum model, A. Das and A. Mitov, *Physical Review* **D66**, 045030 (2002).
173. Classical transport equation in non-commutative Yang-Mills theory at high temperature, F. T. Brandt, A. Das, J. Frenkel, D. G. C. McKeon and J. C. Taylor, *Physical Review* **D66**, 045011 (2002).
174. Alternative dispersionless limit of N=2 supersymmetric KdV-type hierarchies, A. Das, S. Krivonos and Z. Popowicz, *Physics Letters* **A302**, 87 (2002).

175. Vanishing magnetic mass in QED<sub>3</sub> with a Chern-Simons term, A. Das and S. Perez, *Physical Review* **D66**, 025011 (2002).
176. Dispersion relations for the self-energy in non-commutative field theories, F. T. Brandt, A. Das and J. Frenkel, *Physical Review* **D66**, 065017 (2002).
177. Classical transport equation in non-commutative QED at high temperature, F. T. Brandt, A. Das and J. Frenkel, *Physical Review* **D66**, 105012 (2002).
178. A Lax equation for the non-linear sigma model, J. C. Brunelli, A. Constandache and A. Das, *Physics Letters* **B546**, 167 (2002).
179. Light-front field theories at finite temperature, V. S. Alves, A. Das and S. Perez, *Physical Review* **D66**, 125008 (2002).
180. A Benney like lattice, A. Constandache, A. Das and Z. Popowicz, *Czechoslovak Journal of Physics*, **53**, 1021 (2003).
181. The static effective action for non-commutative QED at high temperature, F. T. Brandt, A. Das, J. Frenkel, S. Pereira and J. C. Taylor, *Physical Review* **D67**, 105010 (2003).
182. Energy-momentum tensor in non-commutative gauge theories, A. Das and J. Frenkel, *Physical Review* **D67**, 067701 (2003).
183. Supersymmetric extensions of the Harry Dym hierarchy, J. C. Brunelli, A. Das and Z. Popowicz, *Journal of Mathematical Physics* **44**, 4756 (2003).
184. Light-front Schwinger model at finite temperature, A. Das and X. Zhou, *Physical Review* **D68**, 065017 (2003).
185. Transport equation for the photon Wigner operator in non-commutative QED, F. T. Brandt, A. Das and J. Frenkel, *Physical Review* **D68**, 085010 (2003).
186. Background field quantization and non-commutative QED, A. Das, J. Frenkel, S. H. Pereira and J. C. Taylor, *Physics Letters* **B577**, 76 (2003).
187. Anomalous magnetic moment of electron in Chern-Simons QED, A. Das and S. Perez, *Physics Letters* **B581**, 182 (2004).
188. Kontsevich product and gauge invariance, A. Das and J. Frenkel, *Physical Review* **D69**, 065017 (2004).
189. Reply to “Comment on “Light-front Schwinger model at finite temperature””, A. Das and X. Zhou, *Physical Review* **D69**, 128702 (2004).
190. Deformed Harry Dym and Hunter-Zheng equations, J. C. Brunelli, A. Das and Z. Popowicz, *Journal of Mathematical Physics* **45**, 2646 (2004).

191. On an integrable hierarchy derived from the gas dynamics, J. C. Brunelli and A. Das, *Journal of Mathematical Physics* **45**, 2633 (2004).
192. Chiral bosonization for non-commutative fields, A. Das, J. Gamboa, F. Méndez and J. López-Sarrión, *Journal of High Energy Physics (JHEP)* **005**, 022 (2004).
193. Monodromy matrix in the pp-wave limit, A. Das, J. Maharana and A. Melikyan, *International Journal of Physics* **19**, 4503 (2004).
194. Bosonic reduction of susy generalized Harry Dym equation, A. Das and Z. Popowicz, *Journal of Physics* **A37**, 1 (2004).
195. Quantization in a general light-front frame, A. Das and S. Perez, *Physical Review* **D70**, 065006 (2004).
196. Quantum mechanics of a charged particle in an axial magnetic field, A. Das, J. Frenkel, S. H. Pereira and J. C. Taylor, *Physical Review* **A70**, 053408 (2004).
197. Path integral approach to residual gauge fixing, A. Das, J. Frenkel and S. Perez, *Physical Review* **D70**, 125001 (2004).
198. The algebra of transition matrices for the  $AdS_5 \times S^5$  superstring, A. Das, J. Maharana, A. Melikyan and M. Sato, *Journal of High Energy Physics (JHEP)* **12**, 055 (2004).
199. A nonlinearly dispersive fifth order integrable equation and its hierarchy, A. Das and Z. Popowicz, *Journal of Nonlinear Mathematical Physics*, **12**, 105 (2005).
200. Propagators with the Mandelstam-Leibbrandt prescription in the light-cone gauge, A. Das and J. Frenkel, *Physical Review* **D71**, 087701 (2005).
201. Unruh effect in the generalized light-front frame, A. Das, J. Frenkel and S. Perez, *Physical Review* **D71**, 105018 (2005).
202. Supersymmetric non-local gas equation, A. Das and Z. Popowicz, *Journal of Mathematical Physics* **46**, 082702 (2005).
203. Thermal operator representation of finite temperature graphs, F. T. Brandt, A. Das, O. Espinosa, J. Frenkel and S. Perez, *Physical Review* **D72**, 085006 (2005).
204. The algebra of flat currents for the string on  $AdS_5 \times S^5$  in the light-cone gauge, A. Das, A. Melikyan and M. Sato, *Journal of High Energy Physics (JHEP)* **11**, 015 (2005) .
205. Gauge field theory in the infrared regime, A. Das, J. Gamboa, J. López-Sarrión and F. A. Schaposnik, *Physical Review* **D72**, 107702 (2005).
206. Thermal operator representation for finite temperature graphs II, F. T. Brandt, A. Das, O. Espinosa, J. Frenkel and S. Perez, *Physical Review* **D73**, 065010 (2006).

207.  $N = 1, 2$  supersymmetric non-local gas equation, A. Das and Z. Popowicz, Czechoslovak Journal of Physics **55**, 1373 (2006).
208. Matter-antimatter asymmetry generated at low temperatures, J. M. Carmona, J. L. Cortés, A. Das, J. Gamboa and F. Méndez, Modern Physics Letters **A21**, 883 (2006).
209. Factorization of finite temperature graphs in thermal QED, F. T. Brandt, A. Das, O. Espinosa, J. Frenkel and S. Perez, Physical Review **D73**, 067702 (2006).
210. Physics of quantum relativity through a linear realization, A. Das and Otto C. W. Kong, Physical Review **D73**, 124029 (2006).
211. Large-order perturbation theory and de Sitter/anti de Sitter effective actions, A. Das and G. Dunne, Physical Review **D74**, 044029 (2006).
212. Thermal operator and cutting rules at finite temperature and chemical potential, F. T. Brandt, A. Das, O. Espinosa, J. Frenkel and S. Perez, Physical Review **D74**, 085006 (2006).
213. Forward scattering amplitudes and the thermal operator representation, F. T. Brandt, A. Das, J. Frenkel and S. Perez, Physical Review **D74**, 125005 (2006).
214. Violation of CPT and Lorentz invariance, neutrino oscillation and the early universe, P. Arias, A. Das, J. Gamboa, J. López-Sarrión and F. Méndez, Physics Letters **B650**, 401 (2007).
215. Book review of “Feynman’s thesis: A new approach to quantum theory, ed. L. M. Brown”, A. Das, Classical and Quantum Gravity **24**, 253 (2007)
216. Hard thermal effective actions in the Schwinger formulation, A. Das and J. Frenkel, Physical Review **D75**, 025021 (2007).
217. Hard thermal effective action in QCD through the thermal operator, A. Das and J. Frenkel, Physical Review **D76**, 025009 (2007).
218. Thermal operator and dispersion relation in QED at finite temperature and chemical potential, A. Das and J. Frenkel, Physical Review **D76**, 087701 (2007).
219. The S-matrix of the Faddeev-Reshetekhin model, diagonalizability and  $PT$  symmetry, A. Das, A. Melikyan and V. O. Rivelles, Journal of High Energy Physics (JHEP) **09**, 107 (2007).
220. A simple and direct method for generating travelling wave solutions for nonlinear integrable equations, D. Bezeia, A. Das, L. Losano and A. Silva, Annals of Physics **323**, 1150 (2008).

221. Origin of the geometric tachyon, A. Das, S. Panda and S. Roy, *Physical Review* **D78**, 061901 (2008).
222. Thermal instability in a gravity-like scalar theory, F. T. Brandt, A. Das and J. Frenkel, *Physical Review* **D78**, 065030 (2008).
223. Non-commutative supersymmetric quantum mechanics, A. Das, H. Falomir, J. Gamboa and F. Méndez, *Physics Letters* **B670**, 407 (2009).
224. Proper acceleration, geometric tachyon and dynamics of a fundamental string near  $Dp$  branes, A. Das, S. Panda and S. Roy, *Classical and Quantum Gravity* **26**, 055004 (2009).
225. The structure of supersymmetry in  $\mathcal{PT}$  symmetric quantum mechanics, D. Bazeia, A. Das, L. Greenwood and L. Losano, *Physics Letters* **B673**, 283 (2009).
226. An alternative construction of the positive inner product in non-Hermitian quantum mechanics, A. Das and L. Greenwood, *Physics Letters* **B678**, 504 (2009).
227. Finite temperature effective actions, A. Das and J. Frenkel, *Physics Letters* **B680**, 195 (2009).
228. Effective actions at finite temperature, A. Das and J. Frenkel, *Physical Review* **D 80**, 125039 (2009).
229.  $V$ - $A$  theory: A view from the outside, A. Das, *J. Phys.:Conf Ser.* **196**, 012004 (2009).
230. Generating travelling wave solutions, D. Bazeia, A. Das, L. Losano and M. Santos, *Applied Mathematics Letters* **23**, 681 (2010).
231. An alternative construction of the positive inner product for pseudo-Hermitian Hamiltonians: Examples, A. Das and L. Greenwood, *Journal of Mathematical Physics* **51**, 042103 (2010).
232. The response of laser interferometers to a gravitational wave, A. Melissinos and A. Das, *American Journal of Physics* **78**, 1160 (2010).
233. Thermal effective action for  $1 + 1$  dimensional massive QED, A. Das and J. Frenkel, *Physical Review* **D82**, 125002 (2010).
234. Darboux transformation and multi-soliton solutions of the two boson hierarchy, A. Das and U. Saleem, *Modern Physics Letters* **A26**, 625 (2011).
235. Infrared anomaly at finite temperature, A. Das and J. Frenkel, *Physics Letters* **B 696**, 556 (2011).
236. Generalization of the Cooper pairing mechanism for spin-triplet in superconductors, A. Das, J. Gamboa, F. Méndez and F. Torres, *Physics Letters* **A 375**, 1756 (2011).

237. Finite temperature effective actions, A. Das, XIV Mexican School of Particles and Fields, Journal of Physics: Conference series **287**, 012006 (2011).
238. Pseudo-Hermitian quantum mechanics, A. Das, XIV Mexican School of Particles and Fields, Journal of Physics: Conference series **287**, 012002 (2011).
239. Phenomenological implications of  $S$  duality symmetry, A. Das and J. Maharana, Physics Letters **B 669**, 264 (2011).
240. Aharonov-Bohm effect in a class of noncommutative theories, A. Das, H. Falomir, J. Gamboa, F. Méndez and M. Nieto, Physical Review **D84**, 045002 (2011).
241. The thermal chiral anomaly in the Schwinger model, A. Das and J. Frenkel, Physics Letters **B704**, 85 (2011).
242. Motion of a test particle in the transverse space of  $Dp$ -branes, A. Bhattacharjee, A. Das, L. Greenwood and S. Panda, International Journal of Modern Physics **D21**, 1250056 (2012)..
243. Supersymmetry, shape invariance and the Legendre equations, D. Bazeia and A. Das, Physics Letters **B715**, 256 (2012).
244. Causal amplitudes in the Schwinger model at finite temperature, A. Das, R. R. Francisco and J. Frenkel, Physical Review **D86**, 047702 (2012).
245. Particle-antiparticle asymmetry from magnetogenesis through the Landau mechanism, D. Cárcamo, A. Das, J. Gamboa and M. Loewe, Physics Letters **B718**, 1548 (2013).
246. Infrared divergences, mass shell singularities and gauge dependence of the dynamical fermion mass, A. Das, J. Frenkel and C. Schubert, Physics Letters **B720**, 414 (2013).
247. The pole of the fermion propagator in a general class of gauges, A. Das and J. Frenkel, Physics Letters **B726**, 493 (2013).
248. Gauge independence of the fermion pole mass, A. Das, R. R. Francisco and J. Frenkel, Physical Review **D88**, 085012 (2013).
249. Large time behavior in an exactly soluble out of equilibrium model, A. Das and J. Frenkel, Physical Review **D 89**, 087701 (2014).
250. Supersymmetry, shape invariance and the solubility of the hypergeometric equation, A. Das and P. Kalauni, Modern Physics Letters **A 30**, 1550023 (2015).
251. A path integral approach to the Langevin equation, A. Das, S. Panda and J. R. L. dos Santos, International Journal of Modern Physics **A 30**, 1550028 (2015).



252. Cosmic four-fermion neutrino secret interactions, enhancement and total cross section, D. Cárcamo, A. Das, J. Gamboa, F. Mendez and A. P. Polychronakos, *Physical Review D* **91**, 065028 (2015).
253. Derivation of the fluctuation-dissipation theorem from unitarity, A. Das and J. Frenkel, *Modern Physics Letters A* **30**, 1550163 (2015).
254. Cosmological kinetic mixing, A. Das, J. Gamboa and M. Pino, *Physical Review D* **91**, 123528 (2015).
255. Generalized fluctuation-dissipation theorem in a soluble out of equilibrium model, A. L. M. Britto, A. Das and J. Frenkel, *Physical Review D* **92**, 025020 (2015).
256. Proper time method in de Sitter space, A. Das and P. Kalauni, *Physical Review D* **92**, 104037 (2015).
257. Generalized Kadanoff-Baym relation in nonequilibrium quenched models, A. L. M. Britto, A. Das and J. Frenkel, *Physical Review D* **93**, 105034 (2016).
258. Operator description for thermal quantum field theories on an arbitrary path in the real time formalism, A. Das and P. Kalauni, *Physical Review D* **93**, 125028 (2016).
259. Generalized Dirac duality and CP violation in a two photon theory, P. Arias, A. Das, J. Gamboa and F. Mendez, *Modern Physics Letters A* **32**, 1750032 (2017).
260. Fermion propagator in an external potential and generalized Airy functions, A. L. M. Britto, A. Das and J. Frenkel, to be published in *Modern Physics Letters A* **32**, 1750171 (2017).
261. Testing dark matter with the anomalous magnetic moment in quantum electrodynamics, A. Das, J. Gamboa, F. Mendez and N. Tapia, *Modern Physics Letters A* **32**, 1750175 (2017).
262. Bogoliubov transformation and the thermal operator representation in the real time formalism, A. Das, A. Deshamukhya, P. Kalauni and S. Panda, *Physical Review D* **97**, 045015 (2018).
263. Supersymmetry and the Riemann zeros on the critical line, A. Das and P. Kalauni, *Physics Letters B* **791**, 265 (2019).

## CONFERENCE REPORTS

1. “Strong coupling calculations in supersymmetric field theories”, Proceedings of the sixth MRST meeting, May 1984.

2. "Supersymmetric nonlinear  $\sigma$  model and the charge algebra", Proceedings of the seventh MRST meeting, May 1985.
3. "Dirac quantization in superspace", Proceedings of the Second Asia Pacific physics conference, Bangalore, Jan. 1986.
4. "QCD sum-rules and the electromagnetic form factor of pion", Proceedings of the second Asia Pacific physics conference, Bangalore, Jan. 1986.
5. "Absence of anomaly in the compactified superstring theory in every even dimension", Proceedings of the Current Trends in Physics symposium, Bhubaneswar, Feb. 1986.
6. "Dirac quantization in superspace", Proceedings of the Current Trends in Physics symposium, Bhubaneswar, Feb. 1986.
7. "Path integral solubility of two-dimensional models", Proceedings of the Current Trends in Physics symposium, Bhubaneswar, Feb. 1986.
8. "Dirac quantization in superspace", Proceedings of the eighth annual MRST meeting, May 1986.
9. "The integrability condition for dynamical systems", Proceedings of the annual DPF meeting, Storrs, Connecticut, Aug. 1988.
10. "Four dimensional heterotic string in background and the origin of Chern-Simons terms", Proceedings of the ninth annual MRST meeting, May 1989.
11. "Various aspects of Chern-Simons terms in string theories", Proceedings of Current Trends in Physics, Bhubaneswar Sept. 1-3, 1989.
12. "Introduction to gauge theories and unification", Proceedings of the Advanced Study Institute, St. Croix June 14-26, 1990.
13. "Kac-Moody algebras from covariantization of the Lax operators", Proceedings of "Beyond the Standard Model II", Oklahoma Oct. 31-Nov. 3, 1990.
14. "Zero curvature condition 2d gravity theories", Proceedings of the eleventh MRST meeting, May 1991.
15. "On the zero momentum limit of Feynman amplitudes at finite temperature", Proceedings of the twelfth MRST meeting, May 1992.
16. "Phase transitions in QCD", Proceedings of the Brazilian Physical Society Meeting, Sept. 1993.
17. "The Supersymmetric two boson hierarchy", Proceedings of the Workshop in Theoretical and Mathematical Physics, CAM'95.

18. “Out of equilibrium phase transitions”, Proceedings of the Workshop on Quark-Gluon Plasma and Phase Transitions in the Early Universe, Puri, India, 1997.
19. “Topics in gauge theories at finite temperature”, Proceedings of the Workshop on Quark Gluon Plasma and Phase Transitions, Bhubaneswar, India, Jan 1998.
20. “Supersymmetry and singular potentials”, Proceedings of the Workshop on Supersymmetry and Quantum Symmetries, Dubna, July 1999.
21. “Supersymmetry in singular quantum mechanics”, Proceedings of the Second School on Field Theory and Gravitation, Vitória, April 2000.
22. “Finite temperature and large gauge invariance”, Proceedings of the Second School on Field Theory and Gravitation, Vitória, April 2000.
23. “Finite temperature and large gauge invariance”, Proceedings of the Brazilian Physical Society Meeting, São Lourenço, October 2000.
24. “Finite temperature and large gauge invariance”, Proceedings of the DAE Symposium, Hyderabad, December 2000.
25. “Selected topics in integrable models”, Proceedings of the Swieca Summer School, Campos do Jordão, Brazil, January 2001.
26. “Finite temperature and large gauge invariance”, Proceedings of the 37th Karpacz Winter School, Poland, February 2001.
27. “Noncommutativity of boundary closed string coordinates for an open membrane on  $p$ -brane”, Proceedings of HEP 2001, Budapest, Hungary, July 2001.
28. “Duality and integrability of two dimensional string effective action”, Proceedings of GRG 11, Tokyo, January 2002.
29. “Duality, monodromy and integrability of two dimensional string effective action”, Proceedings of the workshop on Integrable theories, solitons and duality, São Paulo, July 2002.
30. “Finite temperature field theories on the light-front”, Proceedings of the Light-Front Workshop (LC03), Durham, England, Aug 2003.
31. “Supersymmetric and deformed Harry Dym hierarchies”, Proceeding of the International Workshop on Supersymmetries and Quantum Symmetries (SQS’03), Dubna, July 2003.
32. “George Sudarshan”, symposium to honor Prof. E. C. G. Sudarshan, Miami University, Ohio, April 2004.

33. “Susy generalized Harry Dym equation and its bosonic reduction”, Czechoslovak Journal of Physics **54** (2004) 1209.
34. “Thermal operator representation of Feynman graphs”, XXVI Encontro Nacional de Física de Partículas e Campos, São Lourenço, October (2005), Brazilian Journal of Physics **36**, 1130 (2006).
35. “CPT/Lorentz invariance violation and quantum field theory”, Fifth international conference on mathematical methods in physics – IC2006, Rio de Janeiro (2006), PoS (IC2006) 022.
36. “V-A theory: A view from the outside”, J. Phys.:Conf Ser. **196**, 012004 (2009).
37. “Finite temperature effective actions”, XIV Mexican School of Particles and Fields, November (2010).
38. “Pseudo-Hermitian quantum mechanics”, XIV Mexican School of Particles and Fields, November (2010).

### TECHNICAL REPORTS

1. Efimov effect in Faddeev language, A. Das, M. S. thesis, University of Delhi.
2. Unification formula for nested gauge hierarchies, N. P. Chang, A. Das and J. Perez-Mercader, CCNY-HEP 79/22.
3. BRS transformations with auxiliary fields and nonlinear gauge fixing, A. Das, MD81-089.
4. Degenerate potentials, classical stability and supersymmetric Yang Mills theories, A. Das and A. J. Dragt, Maryland preprint.
5. Spontaneously broken supersymmetric SO(10) GUT, A. Das and S. Kalara, Rochester preprint-UR843.
6. Are massless supersymmetric gauge theories really massless, A. Das, ICTP preprint IC/80/73.
7. Meson form-factors and QCD sum-rules, A. Das, S. R. Dasu, V. S. Mathur and P. Panigrahi, Rochester preprint-UR923.
8.  $1/N$  pathologies of the  $CP^{N-1}$  model, A. Das and K. L. Kowalski, Rochester preprint-UR910.
9. Comments on “One parameter class of solutions in the chiral Schwinger model”, A. Das, Rochester preprint-UR963.

10. Six lectures on conformal field theory, A. Das, Rochester preprint UR1127.
11. Conformal symmetry, A. Das, Universidade Brasilia preprint.
12.  $\delta$ -expansion and self-consistent calculation, P. F. Bedaque and A. Das, UR-1289.
13. Lectures on finite temperature field theory, A. Das, Mehta Research Institute Publication (1995).
14. KdV and NLS equations as tri-Hamiltonian systems, J. C. Brunelli and A. Das, UR-1391, hep-th/9410165.
15. Dynamical supersymmetry, A. Das and M. Hott, UR-1416, hep-th/9504059.
16. Proper time method for fermions, A. Das and C. Farina, hep-th/9807152.
17. Parity-breaking electromagnetic interactions in thermal QED<sub>3</sub>, F. T. Brandt, A. Das and J. Frenkel, hep-ph/0004195.
18. Comment on “Supersymmetry in the half-oscillator - revisited”, A. Das and S. Pernice, hep-th/0207112.

## BOOKS

1. Quantum mechanics: A modern introduction, A. Das and A. C. Melissinos, Gordon and Breach Publisher (1986).
2. Integrable models, A. Das, World Scientific Publishing (1989).
3. Nuclear and particle physics, A. Das and T. Ferbel, John Wiley (1993).
4. Field theory: A path integral approach, A. Das, World Scientific Publishing (1993).
5. Kern-und teilchenphysik, A. Das and T. Ferbel, Spektrum Akademischer Verlag, Germany (1995).
6. Field theories at finite temperature, A. Das, World Scientific Publishing (1997).
7. Lectures on quantum mechanics, A. Das, Hindustan Publishing, India (2003).
8. Introduction to nuclear and particle physics (second edition), A. Das and T. Ferbel, World Scientific, Singapore (2003).
9. Lectures on electromagnetism, A. Das, Hindustan Publishing, India (2004).
10. Field Theory: A path integral approach (second edition), A. Das, World Scientific, Singapore (2006).

11. Solution manual for nuclear and particle physics, C. Bromberg, A. Das and T. Ferbel, World Scientific (2006).
12. Lectures on quantum field theory, A. Das, World Scientific (2008).
13. Lectures on gravitation, A. Das, World Scientific (2011).
14. Introduction to nuclear and particle physics (Korean translation), A. Das and T. Ferbel, Bumhanbook, South Korea (2011).
15. Introduction to nuclear and particle physics (Japanese translation), A. Das and T. Ferbel, Kyoritsu publishing, Japan (2011).
16. Lectures on quantum mechanics (second edition), A. Das, Hindustan Book Agency and World Scientific (2011).
17. Lectures on electromagnetism (second edition), A. Das, Hindustan Book Agency and World Scientific (2013).
18. Lie groups and Lie algebras for physicists, A. Das and S. Okubo, Hindustan Publishing and World Scientific Publishing (2014).
19. Field Theory: A path integral approach (third edition), A. Das, World Scientific (2019).
20. Advanced topics in integrable models, A. Das, (in preparation).

### **EDITOR**

1. Proceedings of the seventh MRST meeting, ed. A. Das (1985).
2. Proceedings of the ninth MRST meeting, ed. A. Das (1987).
3. From symmetries to strings: Forty years of Rochester conferences, ed. A. Das, World Scientific Publishing (1990).
4. From spectroscopy to chaos, ed. A. Das and D. Koltun, World Scientific Publishing (1995).
5. Probing luminous and dark matter, ed. A. Das and T. Ferbel, World Scientific Publishing (2000).