

2 **College of Natural Sciences and Mathematics**3 **Department of Physics and Astronomy**4 **Policy on Reappointment, Tenure, and Promotion (RTP)**5 **1.0 Guiding Principles and Preamble**

6 This document articulates how the Department of Physics and Astronomy implements the
7 criteria and standards set forth in the College of Natural Sciences and Mathematics (CNSM)
8 RTP policy. The guidelines below describe discipline-specific expectations in the Department
9 for demonstrating achievement in research, instruction, and service, consistent with College
10 and University policy.

11 The faculty of the department has an indispensable role in supporting the overall educational
12 mission of the university, college, and department. While all units and bodies of the university
13 have a duty to advance this overall mission, it is the tenured and tenure-track faculty alone
14 who have been charged with responsibilities in instruction, the creation of new knowledge as a
15 pedagogical tool, and the running of the various academic projects and programs of the
16 university.

17 The faculty of the department is dedicated to a mission whose major components are:

- 18 * to provide high-quality instruction by faculty, for whom excellent teaching is a high
19 priority and who produce ideas and innovations that continually improve teaching and
20 learning;
- 21 * to conduct original research that leads to new knowledge, and to publish and present
22 scholarly and creative works that advance all fields of physics, astronomy, and physics
23 education;
- 24 * to provide opportunities for students to participate in research projects with faculty, who
25 consider continuing scholarly activity a responsibility both to their students and
26 discipline;
- 27 * to seek external funding from public and private sources in support of our mission;
- 28 * to provide students and faculty with high-quality learning and teaching environments,
29 respectively, and to foster an atmosphere that encourages and supports collegial
30 interaction, personal growth, and intellectual achievement;
- 31 * to support a diversity of emphasis and expertise in faculty assignments, because the
32 department's goals are most fully realized when each faculty member maximizes their
33 contribution, though those contributions may differ in area and emphasis.

34 Evaluators should recognize that the establishment of a fully functional and productive research
35 laboratory in physics can vary significantly across sub-fields, depending on the nature and
36 complexity of the work. Candidates are encouraged to describe any such setup-related
37 circumstances that may have influenced the timing of their research accomplishments.

38 **2.0 Criteria Related to Areas of Evaluation**

39 The RTP areas of consideration are defined in the CNSM CSULB RTP Policy in Article 2.0. If not
40 specifically designated in the university or college RTP policies, a candidate must identify the
41 area—instruction and instructionally related activities; research, scholarly and creative activities
42 (RSCA); service and engagement at the university, in the community, and in the profession—in
43 which a given contribution is to be considered. The specified contribution will only be considered in
44 the one identified area and will be excluded from consideration in the other two areas. If the
45 committee decides that a contribution belongs in another area, the committee will provide written
46 justification.

52
53 In addition to assessing the quality and quantity of specified requirements for ratings of
54 "Competent" and "Excellent", the evaluators shall apply a holistic and comprehensive approach
55 when assessing the overall quality and significance of the candidate's accomplishments in each
56 area of evaluation.

57
58 **2.1 Instruction and Instructionally Related Activities**

59 The candidate should refer to Articles 2.1 through 2.2 of the CNSM RTP Policy with the
60 following emphases and specifics.

61
62 Given the department's mission, the faculty members are expected to provide high-quality
63 instruction and produce ideas that contribute to the improvement of teaching and learning.
64 The department RTP committee will evaluate the candidate's contributions in a) teaching
65 lecture or laboratory classes, with consideration of all courses at every level taken into the
66 analysis of performance and b) the quality of mentoring that students receive in research
67 and directed study. These contributions will be the most important factors in assessing
68 instruction and instructionally related activities in the department.

69
70 i. Candidates will specify student learning outcomes for their courses. For course
71 assessment purposes, candidates will submit artifacts of student work from
72 examinations demonstrating acquisition of disciplinary skills such as physical reasoning
73 and mathematical calculations. Assessments of 100-level courses may include pre-
74 instruction/post-instruction scores on multiple-choice instruments recognized and
75 validated by the physics education research community (e.g., the Force Concept
76 Inventory).

77 ii. Peer observation of instruction will occur as described in the CNSM policy.

78 iii. Candidates and evaluators will analyze the standard university course evaluations in
79 the context of department and college means and should comment on any qualitative
80 factors affecting these evaluations. Evaluators and candidates shall treat grading
81 information and practices with care. Interpreting grading distributions divorced from
82 the overall context of the pedagogical tools in use in a particular course can lead to
83 both false pictures of deficiencies as well as excellence. The CNSM RTP policy gives the
84 guidance that courses with a low completion rate should be analyzed by the candidate
85 in their narratives. Important factors to consider are the number of preparations for
86 different courses in a given semester, the enrollment of the courses involved, if a
87 course is being newly taught in a given semester, level of course, and any other factor
88 strongly affecting the effort required to teach a given assignment.

89 iv. Mentoring research students means substantial participation, evaluated in quality of
90 the creative activity of the student and quantity of mentored students, in the
91 supervision of student research, thesis research supervision, and the preparation of
92 students for the presentation of such research, in addition to successfully bringing such
93 research to a form of reportable conclusion in a reasonable time.

94
95 **2.2 Research, Scholarly, and Creative Activities**

96 Given the department's mission, candidates are expected to conduct scholarly research on
97 an ongoing and sustained basis. Each candidate for tenure or promotion is required to have
98 a record of publication that provides evidence of

99
100 i. the quality of their scholarly activity, and
101 ii. a sustained research program that involves students.

102
103 For purposes of alignment with the intent of the CNSM policy, the Department of Physics and
104 Astronomy defines the phrase "identified as a senior investigator", as used in paragraph 2.3.1 of

105 the CNSM RTP Policy, to mean that the candidate appears as an author on the publication *and*
106 that the candidate has made a major contribution to the work presented in the publication as
107 described in the candidate's narrative and assessed by evaluators. Candidates will specify what,
108 if any, institutional support they received to produce research contributions, be they reassigned
109 WTU, stipends, grants for equipment or other resources.

110
111
2.3 Service

112 Service includes service to the discipline, the departmental community (including students and
113 staff), the college, the university, the local or the professional community. Meaningful service
114 must be clearly related to the mission of the university. Candidates will specify what, if any,
115 institutional support they received to produce service contributions, be they reassigned WTU,
116 stipends, grants for equipment or other resources.

117
118
3.0. Responsibilities and Procedures in the RTP Process

119 Candidates should note that the narrative must include both a record of the adjustments the
120 candidate has made in response to earlier reviews, if any, and, further, a plan for ongoing
121 professional growth.

122 A major responsibility of the candidate is to make their narrative as clear and cogent as possible
123 to colleagues whose special expertise lies outside the disciplines of the department. These
124 colleagues serve at every level of the RTP decision-making process.

125
126
127

- 128 i. The candidate shall submit a narrative (of no more than the page limit specified in
129 section 3.1 of the college policy) that describes goals and accomplishments during the
130 period of review, including a clear description of the quality and significance of
131 contributions to the three areas of review: 1) instruction and instructionally related
132 activities; 2) research and scholarly and creative activities (RSCA); and 3) service to
133 the university, college, department, community, or disciplinary organizations. The
134 candidate must write in their narrative a description of their teaching efforts including
135 ongoing professional development as a teacher and in the discipline citing evidence.
136 The candidate will clearly describe the overall goals and progress of the scholarly
137 research, the nature of student involvement, the candidate's professional development,
138 and service.
- 139 ii. The candidate shall provide all prior RTP reviews and periodic evaluations over the full
140 review period, including candidate's responses or rebuttals, if any.
- 141 iii. The availability of resources, such as assigned time, from the university, the college, or
142 the department may be addressed by the candidate in their narrative.
- 143 iv. The candidate shall provide all required supplemental documentation, including
144 summary sheets from student evaluations and an index of all supplementary
145 materials.
- 146 v. The documentation should include a description of total teaching assignment each
147 semester, which includes consideration of the official number of WTUs of student
148 contact each semester during the period of review, the level of the courses (100-
149 level to 600-level), and the typical enrollment.
- 150 vi. The candidate is responsible for providing the documentation as well as the
151 context of the achievements. The candidate shall make clear in their materials the
152 activities pertaining to the review period.

153
154
4.0 Timelines

155 Candidates and committees are responsible for following the timelines for this process as laid
156 out in the relevant instructional memo from the University.

158 **5.0 Reappointment, Tenure, and Promotion Criteria**

159 The Department of Physics and Astronomy recognizes and endorses Articles 5.0 through 5.5 of
160 the CNSM RTP Policy, with the following definitions, criteria, and clarifications.

161
162 **5.0.1 Criteria for a "Competent" or "Excellent" Rating in the Area of Instruction and**
163 **Instructionally Related Activities**

164 A rating of "Excellent" in a given area indicates that the candidate has significantly exceeded the
165 standards of a "Competent" rating for that area. In each area, the quality of the overall achievement
166 of the candidate is paramount.

167
168 **5.0.1.1 A "Competent" rating in the area of instruction and instructionally related**

169 **activities** is characterized by university student evaluations reasonably consistent
170 with or exceeding departmental expectations for the same or comparable courses,
171 courses conducted of the appropriate level and content meeting the needs of students
172 to progress in their studies, and effective guidance of supervised research students.
173 Each course should prepare the students for more advanced courses for which the
174 course in question is a prerequisite and build on previous courses in the department.
175 The material presented should be appropriately chosen and current. Course policies
176 and grading practices shall comply with those of the university and college and must
177 be clearly conveyed to students in a timely fashion. The results of grading practices
178 should be consistent with department expectations for the same or comparable
179 courses.

180
181 **5.0.1.2 An "Excellent" rating in the area of instruction and instructionally related**

182 **activities** indicates evidence of sustained success in teaching students in the
183 classroom and achieving student learning outcomes. The department places value on
184 mentoring research students. Substantial participation, evaluated in quality and
185 quantity appropriate for each field of physics, in the supervision of student research,
186 theses research supervision, and the preparation of students for the presentation of
187 such research, in addition to successfully bringing such research to a form of
188 reportable conclusion in a reasonable time, is an important and vital function of
189 teaching within the department. A faculty-led project that leads to a peer-reviewed
190 publication or equivalent with a CSULB student as a significant contributor and co-
191 author is considered strong evidence of instructional excellence. Candidates should
192 address how students engaged in research under their mentorship demonstrated
193 growth and learned new skills. However, such projects alone are not sufficient for an
194 'Excellent' rating; excellence must also be demonstrated through effectiveness in the
195 classroom and meaningful mentoring. For the purposes of evaluation, a peer-reviewed
196 publication or equivalent with a student co-author may be classified by the candidate
197 as a contribution in this area, but the research and creative results of the work are
198 distinct and separate and can be claimed as a contribution in the candidate's scholarly
199 work.

200
201 We recognize that substantial contributions can be made in many areas of teaching and
202 mentoring, and examples of activities that may give rise to the level of a rating of "Excellent"
203 are given in the CNSM RTP Policy in Article 2.2.8. The list below supplements the list of
204 *Examples of Products/Activities* in Article 2.2.8, and is meant to be illustrative of possible
205 activities, neither ordered nor exhaustive of the possibilities. What is determinative toward a
206 rating of "Excellent" is not any particular activity on the lists of examples. Rather, the
207 committee shall look at the overall quality and pattern of participation by the candidate during
208 the period under review. The list is as follows:

210 i. preparation of grant proposals for external funding for teaching projects or
211 instructional laboratories, particularly if funded through a peer-review process;
212 ii. development of a new course that is relevant to the curriculum;
213 iii. organization of or chairing of sessions at meetings such as those of the AAPT;
214 iv. assessment of one's own teaching effectiveness to improve performance in the
215 classroom;
216 v. organization and participation in special scholarly activities for students;
217 mentoring research of students from high schools, other colleges, or
218 universities;
219 vi. support and mentorship of student organizations like the Society of Physics
220 Students (SPS), unless the candidate specifically wishes student organization
221 advising to be considered under service; and
222 vii. other activities that lead to an enhancement of teaching effectiveness, as
223 described and supported by materials in the candidate's narrative and
224 attachments.

225

**226 5.0.2 Criteria for a "Competent" or "Excellent" Rating in the Area of Research, Scholarly,
227 and Creative Activities**

228

229 5.0.2.1 A "Competent" rating in the area of research, scholarly, and creative

230 **activities** requires that the candidate has produced multiple peer-reviewed publications
231 or equivalents in reputable sources of research literature in Physics or Astronomy during
232 the review period. Invited book chapters, topical review articles or peer-reviewed
233 conference proceedings published by the candidate during the review period shall be
234 counted towards this body of scholarly work. At least two of the peer-reviewed
235 publications shall be in an academic, peer-reviewed journal. The candidate must make a
236 significant contribution to the publications or equivalents, which must be a part of a
237 research program developed by the candidate while a member of the faculty.

238

239 5.0.2.2 An "Excellent" rating in the area of research, scholarly, and creative

240 **activities** requires a record of peer-reviewed publication in the period of review over and
241 above that required for the "Competent" rating. In addition, other RSCA contributions are
242 required. These may include successfully funded external grant awards in which the
243 candidate appears as an author or PI and has made a major contribution to the work.
244 Faculty should describe their efforts and the process by which they guide students toward
245 scholarly outcomes (such as theses, peer-reviewed publications, or conference presentations),
246 as the department places high value on mentoring students and regards such contributions as
247 an indicator of instructional excellence.

248 The list below supplements the list of *Examples of Products/Activities* in the CNSM RTP
249 Policy, is meant to be illustrative of other possible activities, and is neither ordered nor
250 exhaustive of the possibilities that may be considered in this category. A rating of
251 "Excellent" is not warranted by any particular activity on the lists of examples, rather
252 the committee shall look at the overall quality and pattern of participation by the
253 candidate during the period under review in order to justify a rating of "Excellence".
254 These additional examples include:

255

256 i. high-quality applications for external funds to support ongoing scholarly and
257 creative work;
258 ii. peer-reviewed research publications or equivalents and awards in the area of
259 physics, including physics education research or astronomy;
260 iii. colloquia on the candidate's research presented at universities or government or
261 commercial laboratories.
262 iv. Initiating and sustaining scientific collaborations

263 v. peer-reviewed University level awards
264

265 **5.0.3 Criteria for a "Competent" or "Excellent" Rating in the Area of Service**

266
267 **5.0.3.1 A "Competent" rating in the area of service** indicates effective service
268 contributions at the department and College level, which must be documented in the
269 narrative. The candidate is expected to broaden their contributions past the
270 departmental level after reappointment. This documentation will typically involve a
271 description of achievements as a member of various elected, standing, or *ad hoc*
272 committees.

273
274 **5.0.3.2 An "Excellent" rating in the area of service** will be documented by significant
275 leadership in service within the department, service activity at the college, and service
276 at either the university, or in the professional discipline community. The emphasis in
277 the evaluation shall be on the quality and significance of the service activities and the
278 extent and level of involvement. The quality of that service is the primary
279 consideration. Service contributions based on discipline-related, voluntary
280 consultancies must be clearly related to the university profession of the faculty
281 member.

282
283 **5.1 Reappointment Consideration for Probationary Faculty (Article 5.1 of the CNSM**
284 **RTP Policy):** The Department of Physics and Astronomy recognizes and endorses Article 5.1
285 in the CNSM RTP Policy.

286
287 **5.2 Awarding of Tenure (Article 5.2 of the CNSM RTP Policy):**

288 To merit a recommendation for tenure from the Department Committee, the candidate must
289 receive a rating of "excellent" in either Instruction and Instructionally Related Activities or in
290 RSCA. Should the department chair elect to submit an independent evaluation, the same
291 standard shall apply to that evaluation. Tenure recommendations are based on the positive
292 evaluation of the quality of the candidate's overall record of accomplishments at CSULB and a
293 demonstrated potential for the continuation of this record.

294
295 **5.3 For Promotion to Associate Professor (Article 5.3 of the CNSM RTP Policy):**

296 To merit a recommendation for promotion from the Department Committee, the candidate
297 must receive a rating of "excellent" in either Instruction and Instructionally Related
298 Activities or in RSCA. Should the department chair elect to submit an independent evaluation,
299 the same standard shall apply to that evaluation.

300
301 **5.4 For Promotion to Professor (Article 5.4 of the CNSM RTP Policy):**

302 A recommendation that a candidate be promoted to the rank of professor indicates that, in the
303 department's judgment, the candidate is a significant scholar and educator with a track record
304 clearly showing growth and important contributions to all aspects of the department's core
305 mission. To achieve a positive recommendation from the departmental level, the quality of the
306 candidate's contributions must be judged at least "Competent" in all areas of review and must
307 be judged as "Excellent" in at least one area.

308
309 i. To merit a rating of "Excellent" in instructionally related activity, a candidate must
310 meet the standards set forth in 5.0.1.2 and have a clear record of effectively using
311 course assessments to address the quality of both teaching and learning.
312 ii. To merit a rating of "Excellent" in RSCA, the candidate's program of research must
313 be ongoing and productive at a level significantly higher than that set forth in 5.0.2.2.
314 Activities drawn from contributions in Article 2.3.2.3 of the CNSM RTP Policy and

315 Article 5.0.2.2 of this policy may be cited as evidence in support of a rating of
316 "Excellent".

317 iii. To merit a rating of "Excellent" in service, a candidate must have displayed sustained
318 leadership within the department, meeting the standards set forth in 5.0.3.2, and must
319 have served as an elected officer of a standing or *ad hoc* committee at the university or
320 college level, or by serving as an elected officer of a professional physics organization.

321

322 **5.5 Early Tenure or Early Promotion**

323 The department endorses the language of the college policy, Section 5.5. We interpret Section
324 5.5 of the college policy as providing a framework through which the department can provide
325 advice to reviewers at other levels. A negative decision by the department on any early
326 consideration request will be made without creating any negative inference for any future
327 review. The candidate must achieve an "Excellent" rating in all three areas of review and
328 substantially exceed departmental requirements in at least one. Suggestive specific examples
329 of such exceptional achievements made by the candidate while at CSULB, in addition to the
330 representative items in 5.5.2 of the CNSM RTP policy, are:

331

- 332 • Authorship of a peer-reviewed published textbook, monograph or equivalent in Physics
333 at the advanced undergraduate or graduate level
- 334 • Peer-reviewed University level awards for excellence in research, student mentoring,
335 instruction or inclusive excellence
- 336 • Development of patents or licensed technologies.
- 337 • Multiple keynote talks at topical conferences and research meetings
- 338 • Successfully leading multi-institutional or multi-disciplinary grants

339

340 This list is not exhaustive. It is the candidate's burden of proof to make the argument that any
341 particular contribution supporting an early decision is of exceptionally high quality. Candidates
342 may quantify the exceptional nature of their achievements through appropriate statistical
343 measures. They may wish to note the rarity of the contribution in the historical context of the
344 department and university. Thus, it will never be sufficient to simply check off items on a list
345 to build a case for an early decision. Candidates should be aware that evidence that trained
346 physicists would accept as documenting exceptionally high quality may not be sufficient to
347 convince any other level of review of that fact.

348

349 Simply put, a positive early decision in a tenure or promotion process represents the most
350 serious commitment to the candidate on behalf of the entire university, and ultimately the
351 population of the State of California. Candidates should approach requesting early
352 consideration with care.

353

354 **6.0 Amendments**

355 Amendments to this policy will be considered upon submission to the department with the
356 signatures of three tenured or probationary members of the faculty of the department.
357 Written notification to all tenured and probationary faculty members must be provided at
358 least five working days prior to the close of balloting. Affirmative votes by a majority of
359 the tenured and probationary faculty by secret ballot will be required to ratify the
360 amendment. This means a majority of the faculty eligible to cast ballots (not a majority
361 of the ballots cast) must vote in favor of the amendment. Amendments to this policy shall
362 become effective when they have received a favorable vote, and they have the approval
363 of the college council, the college dean, and the provost.

364

365 *Referential* amendments to this policy (i.e. when a section number of the CNSM or
366 University policy is changed through the ordinary procedure) may be made

367 administratively at the discretion of the Chair of the department with notification to the
368 department through a regular agenda item in a meeting of the faculty.