Alaska's University for Alaska's Schools
Prepared for the State of Alaska

In Accordance with:
Senate Bill 241 (2008) 25th Legislative Session
Source Chapter No. HCS CSSB 241 (HES)

AN ACT
A report to the legislature on teacher preparation, retention, and recruitment by the Board of Regents of the University of Alaska

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Presented by:
The University of Alaska Board of Regents
Regent Patricia “Pat” Jacobson, Chair of the Academic & Student Affairs Committee

On February 23, 2011
Alaska's University for Alaska's Schools
PURPOSE STATEMENT
In 2008, the 25th Alaska State Legislature passed Senate Bill 241. The legislation requires the University of Alaska Board of Regents to deliver a report titled “Alaska's University for Alaska's Schools” no later than the 30th legislative day of each regular session of the legislature.

OVERVIEW
The report includes:

• An overview of teacher education graduates from the University of Alaska
• A gap analysis that documents the shortage areas in the Alaska teaching workforce
• The University of Alaska’s efforts to attract, prepare, and retain school teachers and educators for Alaska

ADDENDA
Addenda to supplement the report, per Senate Bill 241, passed during 25th Alaska State Legislature in 2008¹ includes:

• Teacher Education Plan submitted by the Deans of Education at UAA, UAF, and UAS
• Fiscal-note request for the Center for Alaska Education Policy Research to conduct research specific to policy education for the State of Alaska

EDUCATION GRADUATION DATA
The following graph reflects initial teacher education licensure bachelor, master, and licensure-only certificates awarded in elementary and secondary education for the years listed below. Graduates complete their degrees through the University of Alaska Anchorage, University of Alaska Fairbanks, or University of Alaska Southeast.

The above graph shows that the number of university graduates exiting the system with a teaching degree is relatively stable under the current program delivery models available to students majoring in education. Data do not differentiate among students that complete their program via various delivery models. For example, it is not known if more students complete their degree via a distance education model, a traditional college classroom model, or a combination of both delivery models. Efforts are underway to better track success rates and explore delivery models.
Teacher Education Graduates for Alaska by Grade Level

The following graph differentiates between secondary and elementary graduates each year. The sum total of elementary and secondary graduates is equal to the total number of graduates found in the graph above, titled University of Alaska Teacher Education Graduates. On average the number of elementary teachers graduating from the university represents about 55% of the total graduates, compared to the average of secondary teachers, which is slightly less at 45%. Secondary teachers can earn degrees in several endorsement areas, including: mathematics, science, language arts, history/social sciences, art education, or music.

The university graduates slightly more elementary teachers than secondary teachers each year, perhaps because it costs less and takes less time to earn a bachelor degree in elementary education than to earn both a bachelor degree in a content area and complete a teacher certification program, necessary for secondary certification. However, students who invest the time and money to earn a certificate in a high needs area, such as secondary math, science, or special education have more employment opportunities in education.
New Principals for Alaska
The University of Alaska Anchorage and University of Alaska Southeast both offer degree programs to prepare principals. Each program is unique in its delivery model. This provides educators seeking to obtain their administrative licensure with options to complete their degree program via distance education, in a cohort model with summer intensives, or combining more traditional college settings with courses offered via distance and on campus.

Not all graduates seek an administrative position following graduation. There are efforts underway to better track the placement, retention, and hiring of university graduates, especially principals. A more expansive study could identify the number of principals working in Alaska that received their degree from the university, as well as how many principals received a degree and remain in Alaska, but are not working as a school administrator.
Other Endorsements & Degree Programs
Each of the University of Alaska campuses offer a variety of endorsement programs that lead to an advanced degree or, in some cases, a certificate of completion. Some of these programs are designed for current teachers who seek to add an endorsement and/or complete a master degree while also fulfilling requirements for state certification.
New Special Education Teachers
All of the University of Alaska education units now offer degree programs in special education. This has resulted in an upward trend of special education graduates system wide, with the University of Alaska Southeast reporting the highest gains in recent graduates. This five-year growth trend may be leveling off. The overall growth in graduate numbers is a prime example of the university responding to the workforce demands in K-12 schools.

<table>
<thead>
<tr>
<th>Year</th>
<th>Special Educator</th>
<th>Avg AY06-AY08</th>
<th>Avg AY08-AY10</th>
</tr>
</thead>
<tbody>
<tr>
<td>AY06</td>
<td>29</td>
<td>37</td>
<td>50</td>
</tr>
<tr>
<td>AY07</td>
<td>38</td>
<td>37</td>
<td>50</td>
</tr>
<tr>
<td>AY08</td>
<td>38</td>
<td>37</td>
<td>50</td>
</tr>
<tr>
<td>AY09</td>
<td>55</td>
<td>50</td>
<td>50</td>
</tr>
<tr>
<td>AY10</td>
<td>44</td>
<td>50</td>
<td>50</td>
</tr>
</tbody>
</table>

There are several aspects of teaching special education that warrant further research. These include: determining why special education teachers leave at higher rates compared with educators in other teaching positions; what can school districts do to better retain their special education teachers; are there alternative more successful teacher training models to better prepare special education teachers for these challenging assignments; and if special education teachers were compensated more, would that increase retention?
GAP ANALYSIS
Comparing the supply of and demand for teachers remains the best means to determine how many teachers are needed each year in Alaska to fill the vacancies that exist.

**Special Education Teachers**

<table>
<thead>
<tr>
<th>Year</th>
<th>Total</th>
<th>Number</th>
<th>Percent</th>
<th>New teacher</th>
<th>Experienced teacher (movers)</th>
<th>Other new hires</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>924</td>
<td>799</td>
<td>86.5%</td>
<td>18</td>
<td>34</td>
<td>73</td>
</tr>
<tr>
<td>2006</td>
<td>1077</td>
<td>895</td>
<td>83.1%</td>
<td>24</td>
<td>59</td>
<td>100</td>
</tr>
<tr>
<td>2007</td>
<td>1087</td>
<td>920</td>
<td>84.6%</td>
<td>43</td>
<td>68</td>
<td>57</td>
</tr>
<tr>
<td>2008</td>
<td>1040</td>
<td>906</td>
<td>87.1%</td>
<td>30</td>
<td>61</td>
<td>43</td>
</tr>
<tr>
<td>2009</td>
<td>1111</td>
<td>996</td>
<td>89.7%</td>
<td>13</td>
<td>44</td>
<td>57</td>
</tr>
<tr>
<td>2010</td>
<td>1131</td>
<td>987</td>
<td>87.3%</td>
<td>35</td>
<td>52</td>
<td>57</td>
</tr>
</tbody>
</table>

Average Number of Alaska *Special Education Teachers*, AY08-AY10

- Returning teachers: 963
- Experienced Alaskans: 33
- Non-Alaskan experienced teacher: 19
- Alaskan, new teacher: 52
- Non-Alaskan, new teacher: 131

Total: 1,094

New to District: 131
Math Teachers

<table>
<thead>
<tr>
<th>Year</th>
<th>Total</th>
<th>Number</th>
<th>Percent</th>
<th>New teacher</th>
<th>Experienced teacher (movers)</th>
<th>Other new hires</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>532</td>
<td>447</td>
<td>84.1%</td>
<td>12</td>
<td>27</td>
<td>46</td>
</tr>
<tr>
<td>2006</td>
<td>596</td>
<td>511</td>
<td>85.7%</td>
<td>12</td>
<td>28</td>
<td>44</td>
</tr>
<tr>
<td>2007</td>
<td>595</td>
<td>524</td>
<td>88.1%</td>
<td>15</td>
<td>29</td>
<td>26</td>
</tr>
<tr>
<td>2008</td>
<td>588</td>
<td>513</td>
<td>87.3%</td>
<td>17</td>
<td>30</td>
<td>28</td>
</tr>
<tr>
<td>2009</td>
<td>598</td>
<td>540</td>
<td>90.3%</td>
<td>9</td>
<td>18</td>
<td>31</td>
</tr>
<tr>
<td>2010</td>
<td>588</td>
<td>517</td>
<td>87.9%</td>
<td>13</td>
<td>20</td>
<td>38</td>
</tr>
</tbody>
</table>

Average Number of Alaska Math Teachers, AY08-AY10

Total: 591

- Returning Teachers: 523
- Experienced Alaskans: 16
- Non-Alaskan experienced teacher: 22
- Alaskan, new teacher: 13
- Non-Alaskan, new teacher: 17

New to District: 68
Science Teachers

<table>
<thead>
<tr>
<th>Year</th>
<th>Total</th>
<th>Number</th>
<th>Percent</th>
<th>New teacher</th>
<th>Experienced teacher (movers)</th>
<th>Other new hires</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005</td>
<td>458</td>
<td>403</td>
<td>88.1%</td>
<td>12</td>
<td>14</td>
<td>28</td>
</tr>
<tr>
<td>2006</td>
<td>488</td>
<td>425</td>
<td>87.1%</td>
<td>11</td>
<td>20</td>
<td>32</td>
</tr>
<tr>
<td>2007</td>
<td>508</td>
<td>448</td>
<td>88.1%</td>
<td>10</td>
<td>25</td>
<td>26</td>
</tr>
<tr>
<td>2008</td>
<td>487</td>
<td>424</td>
<td>87.0%</td>
<td>19</td>
<td>17</td>
<td>28</td>
</tr>
<tr>
<td>2009</td>
<td>495</td>
<td>451</td>
<td>91.0%</td>
<td>7</td>
<td>14</td>
<td>23</td>
</tr>
<tr>
<td>2010</td>
<td>465</td>
<td>417</td>
<td>89.8%</td>
<td>11</td>
<td>17</td>
<td>19</td>
</tr>
</tbody>
</table>

Average Number of Alaska Science Teachers, AY08-AY10

Total: 483

- Returning teachers: 431
- Experienced Alaskans: 12
- Non-Alaskan experienced teacher: 12
- Alaskan, new teacher: 16
- Non-Alaskan, new teacher: 11

New to District: 52
PLACEMENT OF UNIVERSITY OF ALASKA GRADUATES
Teachers who received their initial teacher preparation from the University of Alaska work in 52 of Alaska’s 54 school districts. Statewide, UA-prepared teachers make up 28 percent of the teaching force. The percent of all certified staff that received any education degree or endorsement from UA is slightly higher – about 32 percent. The table below shows the 15 districts with the highest number of UA-prepared teachers.

<table>
<thead>
<tr>
<th>School District</th>
<th>Number of AY10 teachers whose initial preparation was at UA</th>
<th>Total Teachers</th>
<th>Percent prepared at UA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Anchorage</td>
<td>846</td>
<td>3020</td>
<td>28%</td>
</tr>
<tr>
<td>Fairbanks Borough</td>
<td>416</td>
<td>861</td>
<td>48%</td>
</tr>
<tr>
<td>Mat-Su</td>
<td>263</td>
<td>999</td>
<td>26%</td>
</tr>
<tr>
<td>Juneau</td>
<td>146</td>
<td>367</td>
<td>40%</td>
</tr>
<tr>
<td>Kenai Peninsula</td>
<td>142</td>
<td>615</td>
<td>23%</td>
</tr>
<tr>
<td>Lower Kuskokwim</td>
<td>57</td>
<td>296</td>
<td>19%</td>
</tr>
<tr>
<td>Kodiak Island</td>
<td>38</td>
<td>195</td>
<td>19%</td>
</tr>
<tr>
<td>Ketchikan</td>
<td>28</td>
<td>158</td>
<td>18%</td>
</tr>
<tr>
<td>Sitka</td>
<td>28</td>
<td>109</td>
<td>26%</td>
</tr>
<tr>
<td>Northwest Arctic</td>
<td>23</td>
<td>145</td>
<td>16%</td>
</tr>
<tr>
<td>Galena</td>
<td>21</td>
<td>64</td>
<td>33%</td>
</tr>
<tr>
<td>Lower Yukon</td>
<td>20</td>
<td>150</td>
<td>13%</td>
</tr>
<tr>
<td>Yukon Koyukuk</td>
<td>20</td>
<td>55</td>
<td>36%</td>
</tr>
<tr>
<td>Bering Strait</td>
<td>19</td>
<td>180</td>
<td>11%</td>
</tr>
<tr>
<td>North Slope</td>
<td>16</td>
<td>174</td>
<td>9%</td>
</tr>
<tr>
<td>Remaining 39 School Districts</td>
<td>256</td>
<td>1073</td>
<td>24%</td>
</tr>
<tr>
<td>Alaska Total</td>
<td>2339</td>
<td>8461</td>
<td>28%</td>
</tr>
</tbody>
</table>
EFFORTS TO ATTRACT, TRAIN, AND RETAIN QUALIFIED SCHOOL TEACHERS
To increase the number of teachers prepared in Alaska, more Alaska students will need to enroll in and complete degree programs in education. The University of Alaska has an array of programs and activities designed to support the recruitment and retention of K-12 educators. In addition, the university offers a variety of college-bridging programs designed to help students’ transition to post secondary education. All of these efforts are an integral part of the system. Programs that serve future education students can be found on both the main campuses and branch campuses.

In November of 2010 MAUs submitted information and data on programs that provide outreach and college bridging activities. The following is a synopsis of the information. Often, supplementary funding from federal, state and local sources is used to support many of the programs. It is equally important to note there is a large number of activities and programs supported by UA general funds. In addition, significant voluntary donations of time and energy from students, staff and faculty underscore the commitment within the university system to engage in outreach activities at all levels.

University of Alaska Outreach and College & Career Bridging Programs

- 266 program specific reports were collected. Each report includes a program description, the location of where the program is administered, and the funding sources used to administer the program.

- Roughly half of the programs report a combination of funding sources to cover the cost of program implementation.
  - 168 programs use UA general funds to fully support or supplement program costs or services; in some cases fees were generated for services.
  - 82 programs receive federal funding, 52 of which report federal funding as the only source to support program costs or services.
  - 68 programs receive state funding, which could include funding from state departments, school districts, or both.
  - Only 34 programs receive private funding, and rarely is private funding the only source of support, in most cases private funding is used to supplement program costs.

Programs were classified as a college/career ready program, a partnership, or an outreach program or activity.

- College Readiness can include college and career preparation programs that typically provide direct academic support to students. Programs may result in college coursework that leads to a degree program. Roughly 72 programs are coded as college/career ready, yet may also be considered a partnership and engage in outreach activities.
Partnerships include dual credit, collaborations with school districts and/or state agencies, as well as federal agencies. A total of 77 programs are coded as partnerships, many with school districts or state agencies.

Youth outreach generally includes programs that provide informational publications, services to schools or in the community, and resources to youth, educators, or general public. Most of these programs do not result in credit towards a degree program. Examples include attending local job fairs, participating in college and career awareness activities, and hosting events on campus to promote post secondary education. 117 programs are coded as outreach.

Most programs could fall into two or more categories, or in some cases be considered a partnership designed to promote college and career awareness with an academic component that awarded college credit for participation.

Other program focus areas include:

- Science, Technology, Engineering, and Mathematics (STEM). STEM was determined by reviewing a list of program descriptions and names. It is estimated that 64 of the 266 programs, 24 percent, focus on Science, Technology, Engineering, or Math as part of their core service.

- Roughly 43 program descriptions note the integration of culture and indigenous knowledge. The University of Alaska is a recipient of federal grants, some grants such as the Alaska Native Education funding and the Indian Education grant from the U.S. Department of Education require a specific emphasis on Alaska Natives or American Indians as a program requirement. That does not mean to imply that other programs do not serve Alaska Native students, nor are programs funded by these grants exclusive to serving only Alaska Natives. The University of Alaska is an equal employment opportunity/affirmative action employer and educational institution.

Efforts are underway to better track, review and measure the effectiveness of the many outreach programs and college bridging activities that promote post secondary education. Providing these services is key to the university mission and with so many programs in place, the President is convening a small team to develop a tracking mechanism that will provide both data and information to the general public regarding the outcomes of the various programs being offered across the state.
RECOMMENDATIONS FOR EDUCATIONAL POLICY RESEARCH
In summer 2010, the University of Alaska Foundation awarded the Institute of Social and Economic Research funding to start the Center for Alaska Education Policy Research.

Education policy research enhances decision-making by policymakers, education professionals, and the public through collaborative, interdisciplinary research, analysis, and dissemination. Non-partisan research on policy issues around educational access, equity and excellence in the Alaska context, across early childhood, primary and secondary, higher and adult education is important for understanding the key educational issues facing Alaska.

What is education policy research?
Education policy research is a broad and evolving field of study. There are a number of topic areas and research approaches that fall under this moniker, from economic studies to examine cost-benefit or “production function” research, organizational studies to look at how policies are implemented, and evaluation studies for assessing the impact and outcomes of policies, programs or activities.

Education policy research can address how policies are developed and the relationship of policies to practice in primary, elementary, secondary, and post secondary education. It also can inform policymaker and educational leaders by answering questions related to what is currently happening in education, why it is happening, and what might be needed to address a particular challenge to address a problem.

Often education research focuses on educational practice, for example teaching or curriculum models, and while those are important areas to understand, it is equally important to understand and research key education topics in Alaska such as:

• K-12 workforce issues: Research in this category addresses teacher supply, demand, retention and compensation.

• P-16 issues: A number of topics fall under this broad area, including college and workforce preparedness, school finance, higher education financial aid models, dual credit and college bridging programs.

• Indigenous and rural education policy: Studies on current policies and alternative options for providing education in rural and remote areas of Alaska are included in this topic area as well as research on current and past boarding schools and a look at the education of indigenous students since the passage of ANCSA.
THREE TO FIVE YEAR PLAN FOR TEACHER PREPARATION

Senate Bill 241 (2008) reads, “The report must include an outline of the university's current and future plans to close the gap between known teacher employment vacancies in the state and the number of state residents who complete teacher training. The information reported under this subsection may also include short-term and five-year strategies with accompanying fiscal notes and outcome measures.”

The Deans of Education are responsible for development of the Teacher Education Plan. The plan, which builds on the efforts of the University of Alaska Education Units are undertaking to place more Alaskans into professional positions in the education system.

FISCAL NOTE REQUEST

In accordance with SB241, “The information reported under this subsection may also include short-term and five-year strategies with accompanying fiscal notes and outcome measures.”

The invitational language is an opportunity to encourage the State of Alaska Joint Committee on Education to fully support the University of Alaska data collection and research efforts through the establishment of the Center for Alaska Education Policy Research (CAEPR).

The University of Alaska is prepared to conduct education policy research through the Center for Alaska Education Policy Research (CAEPR) at the request of the joint education committees. Roughly $250K would allow the education committee to identify several key teacher education research priorities for Alaska.

Requests for Additional Information

For additional information on specific items, questions or copies of the report, please contact Melissa Hill at the University of Alaska at (907) 450-8400

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