Requirements for an undergraduate certificate may be completed at any campus location offering the specified courses for the certificate.

**Program Description**

This certificate program is designed to prepare students for a career in the housing industry. Students are required to take a set of complementary courses in the technology of housing, the development process, and the design and the delivery processes for housing. The minimum number of credits required is 12, with no less than six credits at the 400-level.

**What is Housing?**

This program is designed to provide undergraduate students with a means of developing some basic knowledge of housing and preparing for a career in the housing industry. Housing, from low-rise detached houses to multi-unit, multi-story apartment buildings, from motels to high-rise hotels, from student residences to rural housing, is a major and vital component of the built environment. New single-family housing represents at least 4% of the GDP and housing and its consequences account for about 12% of the GDP. With a national housing stock in excess of 110,000,000 units, the maintenance, operation, repair - and especially the upgrading, retrofit and remodeling of the existing stock - are a very important component of the national economy. Engineers have many important roles to play in the housing business, especially with the developmental, economic and technical aspects of housing.

**Admission Requirements**

For entrance into the certificate program, students must be at least fifth semester standing. The cumulative GPA considered for admission will be consistent with, or equivalent to, the GPA minimum of 2.0 for maintaining good academic standing. Students must earn a C grade or better in each of the four courses to continue with the certificate.

**Program Requirements**

To earn an undergraduate certificate in Housing, a minimum of 12 credits is required.

<table>
<thead>
<tr>
<th>Code</th>
<th>Title</th>
<th>Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td>AE 470</td>
<td>Residential Building Design and Construction</td>
<td>3</td>
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</tbody>
</table>

**Prescribed Courses**

<table>
<thead>
<tr>
<th>Code</th>
<th>Title</th>
<th>Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td>AE 432</td>
<td>Design of Masonry Structures</td>
<td></td>
</tr>
<tr>
<td>AE/CE 542</td>
<td>Building Enclosure Science and Design</td>
<td></td>
</tr>
<tr>
<td>BE 462</td>
<td>Design of Wood Structures</td>
<td></td>
</tr>
</tbody>
</table>

**Additional Courses**

Students must complete an application and choose an additional three courses of the following:

<table>
<thead>
<tr>
<th>Code</th>
<th>Title</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>RM 303 Real Estate Fundamentals</td>
</tr>
</tbody>
</table>

With the approval of the Hankin Chair, one housing-related course of at least 3 credits not included in the list of recommended additional courses (e.g., demographics, urban geography, social housing, etc.) can be substituted for one of the three additional courses.

**Prerequisites Required.**

**Academic Advising**

The objectives of the university's academic advising program are to help advisees identify and achieve their academic goals, to promote their intellectual discovery, and to encourage students to take advantage of both in-and out-of class educational opportunities in order that they become self-directed learners and decision makers.

Both advisers and advisees share responsibility for making the advising relationship succeed. By encouraging their advisees to become engaged in their education, to meet their educational goals, and to develop the habit of learning, advisers assume a significant educational role. The advisee's unit of enrollment will provide each advisee with a primary academic adviser, the information needed to plan the chosen program of study, and referrals to other specialized resources.

**University Park**

Heather Hamby
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hehce@engr.psu.edu

**Career Paths**

The Pennsylvania Housing Research Center (PHRC) hosts an annual career fair for the residential construction industry. This event offers opportunities for full-time employment and summer internships.

**Contact**

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Housing, Certificate

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