Tool Kit
to Determine Students College and Career Ready under the College and Career Readiness and College Completion Act of 2013

Maryland State Department of Education
Effective Date: September 16, 2016
www.marylandpublicschools.org
The Maryland State Department of Education does not discriminate on the basis of age, ancestry/national origin, color, disability, gender identity/expression, marital status, race, religion, sex, or sexual orientation in matters affecting employment or in providing access to programs and activities and provides equal access to the Boy Scouts and other designated youth groups. For inquiries related to departmental policy, please contact: Equity Assurance and Compliance Office, Maryland State Department of Education, 200 West Baltimore Street, Baltimore, Maryland 21201-2595. VOICE: 410-767-0426,TTY/TDD: 410-333-6442.
# TABLE OF CONTENTS

Introduction .................................................................................................................................................. 1

Overview of College and Career Readiness:  
A Partnership with Local School Systems and their Community Colleges .......................... 2

Attachment 2A:  
Local School Systems’ Options for Implementing the CCR-CCA of 2013 .................. 4

Attachment 2B:  
Maryland Career and Technology Education Programs of Study, CCR-CCA of 2013 –  
Technical Skill Assessment Chart by Career Clusters ................................................................. 5

English/Language Arts Credit, Enrollment and Assessment Requirements for Each  
Graduating Class from 2017–2020..................................................................................................... 22

Mathematics Credit, Enrollment and Assessment Requirements for Each Graduating  
Class from 2017–2020 ....................................................................................................................... 27

English Language Arts (ELA) Credit, Enrollment  
and Assessment Requirements Frequently Asked Questions..................................................... 33

Mathematics Credit, Enrollment and Assessment Requirements Frequently Asked  
Questions ............................................................................................................................................. 40
INTRODUCTION

The College and Career Readiness and College Completion Act of 2013 (CCR-CCA) established a number of requirements designed to increase college and career readiness as well as degree completion in Maryland. With a rapidly changing economy and a focus on increasing the percent of young adults with postsecondary degrees, the intent of the Act is to reduce or eliminate the need for students to enroll in remedial courses in college. Students, who enter college prepared, typically benefit from improved persistence and are more likely to complete a degree.

This tool kit provides information to assist local school system staff members in implementing the provisions of the CCR-CCA that relate to preparing students for both college and careers. Under §7-205.1 of the Education Article of the Annotated Code of Maryland: “Beginning with the 2015-2016 school year, all students shall be assessed using acceptable college placement cut scores no later than 11th grade to determine whether the student is ready for college-level credit-bearing course work in English Language Arts, Literacy and Mathematics.” It further requires that “transition courses or other instructional opportunities shall be delivered in the 12th grade to students who have not achieved College and Career Readiness (CCR) by the end of the 11th grade. The implementation of transition courses or other instructional opportunities…shall include an assessment or reassessment of the student after completion of the course; and may not preclude or replace enrollment in a course otherwise required for graduation from high school.” The information provided in this tool kit will assist in designating students who are College and Career Ready and identifying options and requirements for students who are not ready.

Currently, the Every Student Succeeds Act (ESSA) Stakeholder Group and related work groups are providing input to the state plan that will determine how this new federal law is implemented in Maryland. Accordingly, the tool kit is considered a living document that will continue to be updated to reflect future changes in policies and practices while remaining in alignment with the CCR-CCA.

This document is available on the Maryland State Department of Education’s website at www.marylandpublicschools.org. If you have any questions, please refer them to the MSDE staff members listed before each section of the tool kit.
Overview of College and Career Readiness:
A Partnership with Local School Systems
and their Community Colleges

The College and Career Readiness and College Completion Act of 2013 (CCR-CCA) requires Maryland to prepare all students for college and careers upon graduation from high school. The goal in the law states that "at least 55% of Maryland's adults aged 25 to 64 years will hold at least an associate's degree by 2025." For local school systems, this goal can best be achieved by building on the close relationships already established between the school systems and the local community colleges.

Community colleges play a critical role in Maryland education as the “next step” for large numbers of high school graduates as:

- the avenue for specific career credentialing through robust AA degrees,
- an affordable start for credit-transfer to a four-year college and a bachelor’s degree,
- a point of return for those seeking career changes and/or advancement,
- a source of enrichment and interest-based learning in a culture of life-long learning.

All students benefit by being eligible for enrollment in credit-bearing courses at their community college in order to engage in dual enrollment courses for academic advancement, career exploration, and learning enrichment. When students leave high school prepared to take credit-bearing college courses, the doors to these opportunities are held open for them. For that reason, passing the admission test that is recognized by the college is viable and valid evidence that students are college and career ready in alignment with the CCR-CCA. Attachment 2A includes examples of ways that students can be designated CCR through Community College partnerships.

Students who have not yet met the CCR designation by the end of 11th grade will continue to work toward this goal in their senior year. Students will be enrolled in transition courses or other learning opportunities prior to reassessment to be designated CCR.

Career/Technology Program (CTE) option for CCR designation:

CTE students are expected to meet the CCR designation in the same manner, with the same options as other students; however, if they complete a State-Approved Career and Technology Education Program of Study, they have an additional reassessment option: a Technical Skills Assessment, recognized by MSDE, leading to early college credit, or to a license or an industry certification (see Attachment 2B).
The following chart illustrates this option:

These varied options support all students in their progress toward college and career readiness (CCR). Each provides students a path that is ambitious but attainable, while respecting their goals, talents, and interests. Graduates must also be aware of the admission requirements of the colleges to which they apply as the acceptable scores for entry vary among two- and four-year colleges.

These standards represent higher expectations for many high school graduates. The partnership of local school systems and their community colleges gives clear academic targets and, as needed, articulated learning supports prior to graduation. Achieving CCR standards positions students for entry into credit-bearing college courses. The result is an economy of time and resources for their future success.

An expanded copy of the Local School System Options for Implementing the CCR-CCA appears on the next page.
<table>
<thead>
<tr>
<th><strong>11th Grade Assessment Options</strong></th>
<th><strong>Can replace CCR Assessment or Senior Coursework</strong></th>
<th><strong>Senior Year Coursework</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>PARCC</strong></td>
<td><strong>SAT</strong></td>
<td><strong>DUAL ENROLLMENT</strong></td>
</tr>
<tr>
<td><strong>English Language Arts (ELA)</strong></td>
<td><strong>English Language &amp; Composition or English Literature &amp; Composition Exam Score of 3, 4, or 5</strong></td>
<td><strong>If a student is not determined college and/or career ready by the end of 11th grade, he/she will:</strong></td>
</tr>
<tr>
<td>English 11 score of level 4 or 5</td>
<td>Score of 500 or greater Evidence-based Reading &amp; Writing (EBRW) Score</td>
<td>Admission to and enrollment in a Maryland IHEs appropriate ELA college credit-bearing course. <strong>Complete an ELA transition course or an additional ELA &quot;instructional opportunity&quot; (online, hybrid, module, etc.) in preparation for re-assessment OR Enroll in a transition course articulated with a community college.</strong> These articulated college courses include, but are not limited to, Developmental English, courses approved by the community college as sufficient preparation for college.</td>
</tr>
<tr>
<td><strong>Mathematics</strong></td>
<td><strong>Algebra II or greater Mathematics Section</strong></td>
<td><strong>Complete a math transition course or an additional math &quot;instructional opportunity&quot; (online, hybrid, module, etc.) in preparation for re-assessment OR Enroll in a transition course articulated with a community college.</strong></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Local Agreements</strong></th>
<th><strong>Career/Tech Programs (CTE)</strong></th>
<th><strong>Notes</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>LEAs may use alternate CCR assessment options if an agreement exists between the LEA and a local community college that allows students to take college-level credit-bearing mathematics or ELA coursework using different metrics.</td>
<td>CTE students who are not designated college and career ready by the end of the 11th grade must be reassessed by the end of the senior year. Reassessment options include all of the CCR Assessment Options listed above for ELA and mathematics, as well as Career and Technology Education (CTE) Program Technical Skills Assessments that lead to a license, an industry certification, or early college credit. An appropriate transition course or other instructional opportunity in conjunction with the completion of a State Approved CTE Program of Study (see Attachment 2B). A Technical Skill Assessment recognized by MDSE leading to a license, or an industry certification, or early college credit is an option for CTE students only.</td>
<td>&quot;If a student is determined &quot;college ready&quot; in mathematics prior to 11th grade, all CCR requirements have been met for mathematics; however, students entering the 6th grade in the 2014-2015 school year shall enroll in a mathematics course in each year of high school that the student attends, up to a maximum of 4 years of attendance, unless in the 5th or 6th year a mathematics course is needed to meet a graduation requirement. <strong>For the 2016-17 school year, LEAs may use the PARCC Geometry assessment as a means to satisfy the CCR assessment requirement for 11th grade students taking Geometry. Please note that a score of 4 or 5 the PARCC Geometry assessment does not indicate readiness for college-level credit-bearing mathematics coursework.</strong>&quot;</td>
</tr>
</tbody>
</table>

*Local Agreements* and *Career/Tech Programs (CTE)*, if included in the original document, are not explicitly detailed in the provided text.
Career and Technology Education (CTE) students are expected to meet the CCR designation in the same manner, with the same options as other students. However, if they complete a State-Approved Career and Technology Education Program of Study, they have an additional **reassessment option**: a Technical Skills Assessment (TSA), recognized by MSDE, leading to early college credit, or to a license or an industry certification. Reassessment options include all of the CCR Assessment Options included on Attachment 2A for English/Language Arts (ELA) and mathematics, as well as those listed on Attachment 2B.

Students must **qualify** to receive the early college credit or industry-recognized credential based on the requirements listed in the attachment. If a CTE completer qualifies for one of the CTE Technical Skill Assessment options prior to 11th grade, they are still required to take both the English/Language Arts and Mathematics assessments. The Technical Skill Assessment options are only considered to be reassessment options. CTE students may “bank” any of the TSAs that they qualify for prior to 11th grade in the event that they do not pass either the ELA or mathematics assessments. CTE Students who do not pass the ELA and/or mathematics assessments are still required to enroll in and complete a transition course or other instructional opportunity. Thus, CTE students may be designated CCR as long as they **complete their CTE program of study** and qualify for the associated industry-recognized credential or early college credit listed in Attachment 2B.

**Please refer questions to:**

**Dr. Lynne M. Gilli**

**Acting Assistant State Superintendent and**
Program Manager, CTE Instructional Branch
Division of Career and College Readiness
Maryland State Department of Education
Telephone: 410.767.0518
Email: lynne.gilli@maryland.gov
ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters

NOTE: These assessments only apply to students who are completing a Career and Technology Education (CTE) State Program of Study. This document will be continuously updated as new information becomes available. All costs listed are estimated and are subject to change.

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td><a href="http://www.gaerf.org">www.gaerf.org</a> The Graphic Arts Education and Research Foundation administers the PrintED program. For information on Skill Connect Assessments for PrintED contact: <a href="http://www.workforcereadysystem.org">www.workforcereadysystem.org</a></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Arts, Media &amp; Communication (AMC)</td>
<td>Printing Technologies (PrintED)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>PrintED accreditation in eight areas: Digital File Preparation &amp; Output; Graphic Design; Offset Press Operations/Bindery &amp; Finishing; and Screen Printing</td>
<td>Teacher is certified through the program. The program accreditation fee also covers the teacher. Students pass the Graphic Communications assessment and one other from the following list: • Advertising and Design; • Digital File Preparation/Digital File Output; or • Offset Press Operations/Binding and Finishing.</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>AMC</td>
<td>Interactive Media Production (IMP)</td>
<td>N/A</td>
<td>N/A</td>
<td></td>
<td><a href="http://www.adobe.com/support/certification/ace_certify.html">http://www.adobe.com/support/certification/ace_certify.html</a> Certiport: Form needed for accommodations, one week prior to test. For form go to: <a href="http://www.certiport.com">http://www.certiport.com</a> Test Candidates/Exam Policy/Accommodations</td>
</tr>
</tbody>
</table>
### ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study
CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td>Business Management &amp; Finance (BMF)</td>
<td>Business Management</td>
<td>College-Level Examination Program (CLEP) OR AP Economics</td>
<td>Program includes AP courses in Economics Pass the CLEP Management Assessment OR Pass both of the AP Economics Exams (credit varies by college)</td>
<td>clep.collegeboard.org</td>
<td>CLEP exams are taken at end of the related course</td>
</tr>
<tr>
<td>BMF</td>
<td>Finance and Accounting</td>
<td>College-Level Examination Program (CLEP) OR AP Economics</td>
<td>Program includes AP courses in Economics Pass the CLEP Accounting Assessment OR Pass both of the AP Economics Exams (credit varies)</td>
<td>clep.collegeboard.org</td>
<td>Accommodations applied in advance. (<a href="http://www.collegeboard.com/clep">www.collegeboard.com/clep</a> or 800-257-9558 ext. 0)</td>
</tr>
<tr>
<td>BMF</td>
<td>Marketing</td>
<td>College-Level Examination Program (CLEP) OR AP Economics</td>
<td>Program includes AP courses in Economics Pass the CLEP Marketing Assessment OR Pass both of the AP Economics Exams (credit varies)</td>
<td>clep.collegeboard.org</td>
<td></td>
</tr>
<tr>
<td>BMF</td>
<td>Administrative Services</td>
<td>Microsoft Office 2010 or 2013 Word and Excel</td>
<td>Program includes AP courses in Economics Pass both the Microsoft Office Word and Excel Exams to earn the MOS certification</td>
<td>microsoft.com/learning/mcp/officespecialist/default.mspx</td>
<td>Microsoft Office Specialist (MOS) certification exams Accommodations applied for through Certiport.</td>
</tr>
</tbody>
</table>
## ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study
CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Construction &amp; Development (CD)</td>
<td>Construction Design and</td>
<td>Maryland Center for Construction Education and Innovation (MCCEI)</td>
<td>Pass Autodesk’s AutoCAD certification assessment</td>
<td>Accommodations applied for through Certiport.</td>
<td>N/A</td>
</tr>
<tr>
<td></td>
<td>Management (CDM)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>MSDE/MCCEI sponsored training at Towson University</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>CD</td>
<td>Construction Trades:</td>
<td>National Center for Construction Education and Research (NCCER)</td>
<td><a href="http://www.autodesk.org">www.autodesk.org</a></td>
<td></td>
<td>Autodesk / Certiport cost determined by school purchase plan for a site license or through bulk purchase of vouchers (costs range from $25 - $55 per exam)</td>
</tr>
<tr>
<td></td>
<td>- Electrical</td>
<td>Instructor Certification Training Program (ICTP)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Plumbing</td>
<td>Pass the National Center for Construction Education and Research (NCCER) – Core: Intro Craft Skills and Level I of trade area</td>
<td>new.nccer.org</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Carpentry</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Masonry</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>CD</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>CD</td>
<td>Construction Maintenance:</td>
<td>National Center for Construction Education and Research (NCCER)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Welding</td>
<td>Instructor Certification Training Program (ICTP)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>- HVAC/R</td>
<td>Pass the National Center for Construction Education and Research (NCCER) – Core: Intro Craft Skills and Level I of trade area</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Mech/Mtn</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>CD</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Consumer Services, Hospitality &amp; Tourism (CSHT)</td>
<td>Food &amp; Beverage Management (ProStart)</td>
<td>N/A</td>
<td>Pass the Level I and Level II end-of-course exams, complete the 400 hour work-based</td>
<td>Two End-of-course assessments (EOC)</td>
<td>N/A</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note: incorporated into the NCCER program are the standards for American Welding Society (AWS) Entry Level certification.

In school testing by teacher – paper or online

Accommodations provided through school-based testing

$25 per NCCT – Core and Level I

$25 per NCCT – Core and Level I

$36 for both exams
## ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study
### CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/ Accommodations</th>
<th>Maryland Certification Costs</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td></td>
<td></td>
<td>Costs may vary by state</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Teacher</td>
<td></td>
<td></td>
<td>Program</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Student</td>
<td></td>
<td></td>
<td>Student</td>
</tr>
<tr>
<td></td>
<td></td>
<td>learning (WBL) experience, and submit the WBL competency checklist to the Maryland Restaurant Association to earn the National ProStart Certificate of Achievement</td>
<td><a href="http://www.acfchefs.org/AM/Template.cfm?Section=Accreditation&amp;Template=/CM/HTMLDisplay.cfm&amp;ContentID=14829">www.acfchefs.org/AM/Template.cfm?Section=Accreditation&amp;Template=/CM/HTMLDisplay.cfm&amp;ContentID=14829</a></td>
<td>End-of-program assessment</td>
<td>N/A</td>
</tr>
<tr>
<td>CSHT</td>
<td>Culinary Arts</td>
<td>Program must be accredited by the American Culinary Federation (ACF)</td>
<td>N/A</td>
<td></td>
<td>$1,200 (initial certification fee)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Certified Junior Culinarian (CJC): Pass NOCTI written with at least a 70% and pass NOCTI practical with at least a 75%. Students must take both the written and performance tests.</td>
<td></td>
<td></td>
<td>$200 annual fee to be submitted with annual report $550 renewal fee (every year) First renewal after 3 years then every 5 years @ $550).</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td><a href="http://www.ahlei.org/Programs/High-School-Program-(HTMP)/">www.ahlei.org/Programs/High-School-Program-(HTMP)/</a></td>
<td></td>
<td>ACF NOCTI Online Written= $19</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Two end of course assessments</td>
<td></td>
<td>Online Written and Practical = $23</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>N/A</td>
<td></td>
<td>Paper Written = $26</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Paper Written and Practical = $30</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>CJC Certificate: $35</td>
</tr>
<tr>
<td>CSHT</td>
<td>Hospitality Tourism Management Program</td>
<td>N/A</td>
<td></td>
<td></td>
<td>All costs for assessments and the CHTMP certification are included in the cost of the students’ workbooks. Each book is $50/book</td>
</tr>
<tr>
<td>Career Cluster</td>
<td>Maryland CTE Programs of Study</td>
<td>Industry-Recognized Certification, License and/or Early College Credit</td>
<td>Websites for Program Information (Additional Accommodations Information)</td>
<td>Testing Procedures/ Accommodations</td>
<td>Maryland Certification Costs Costs may vary by state</td>
</tr>
<tr>
<td>-----------------------------</td>
<td>--------------------------------</td>
<td>------------------------------------------------------------------------</td>
<td>--------------------------------------------------------------------------</td>
<td>-------------------------------</td>
<td>--------------------------------------------------</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Program</td>
</tr>
<tr>
<td>CSHT</td>
<td>Careers in Cosmetology</td>
<td>N/A</td>
<td>Senior Cosmetology License</td>
<td><a href="http://www.dllr.state.md.us/license/cos/cosexams.shtml">www.dllr.state.md.us/license/cos/cosexams.shtml</a></td>
<td>Teacher scheduled</td>
</tr>
<tr>
<td>CSHT</td>
<td>Barbering</td>
<td>N/A</td>
<td>Master Barber License</td>
<td><a href="http://www.dllr.state.md.us/license/barbers/barbersexam.shtml">www.dllr.state.md.us/license/barbers/barbersexam.shtml</a></td>
<td>Teacher scheduled</td>
</tr>
<tr>
<td>EANR</td>
<td>CASE – Curriculum for</td>
<td>N/A</td>
<td>Certified Prof. Hort. Pesticide Applicator</td>
<td><a href="http://mnlga.org">http://mnlga.org</a></td>
<td>End-of-program assessments are being</td>
</tr>
</tbody>
</table>

HTMP Year 1 and Year 2 courses, complete the 100 hour work-based learning (WBL) experience, and complete the requirements outlined in the WBL competency checklist.

The MD State Board of Cosmetology requires students to pass both theory and practical exams to be licensed.

The MD State Board of Barbers requires students to pass both theory and practical exams to be licensed.
<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/ Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agricultural Sciences Education</td>
<td>CASE Institutes for each course they will teach</td>
<td>nationally – no certification or postsecondary credit identified at this time</td>
<td>One test per course offered: AFNR, Principles of Agriculture-Animal, Principles of Agriculture-Plant, Food, Science &amp; Safety, and Plant &amp; Animal Biotechnology</td>
<td>developed by CASE</td>
<td>currently, MSDE provides a statewide license</td>
</tr>
<tr>
<td>Environmental Studies</td>
<td>Complete the program with a satisfactory grade—determined by Towson University (TU) for 3 credits in Environmental Biology awarded by TU</td>
<td>Information found on Towson University Blackboard site; access restricted to trained teachers</td>
<td>End of program testing</td>
<td>Pending</td>
<td>Pending</td>
</tr>
<tr>
<td>Health &amp; Biosciences (HB)</td>
<td>Academy of Health Professions (AHP) AHP/CNA</td>
<td>Specialty Course - Certified Nursing Assistant (CNA) portion must be approved by the MD Board of Nursing (MBON) Must be a Registered Nurse (RN) Pass the teacher-developed Certified Nursing Assistant assessment</td>
<td>Teacher developed and administered In house test, provide accommodations, in-house. Contact: MBON</td>
<td>N/A</td>
<td>CNA Background Checks: State Level: $18 Federal Level: $24 Fingerprinting: $20 Certification: Initial: $20 Renewal (every 2 years): $40</td>
</tr>
</tbody>
</table>
| HB | AHP/GNA | Geriatric Nursing Must be an RN | Pass the National Nurse Aid | Schedule test date through ARC | N/A | GNA (NNAAP) Test (written and
<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program: Assistant (GNA) Teacher: Assessment Program (NNAAP) administered through the American Red Cross. Student: Students must first hold the CNA certificate in order to be eligible to take the GNA exam</td>
<td><a href="http://www.pearsonvue.com/md/nurseaides/">http://www.pearsonvue.com/md/nurseaides/</a> - copy of GNA handbook</td>
<td></td>
<td>$250/student seat license ExCPT exam = $105 or PCTB exam = $129 (Passing scores for either exam are accepted by the MD Board of Pharmacy. ExCPT can be taken by high school students. PCTB requires a high school diploma or equivalent prior to sitting for the exam). $45 application fee DHMH. Background Checks: State Level: $18 Federal Level:</td>
</tr>
<tr>
<td>Career Cluster</td>
<td>Maryland CTE Programs of Study</td>
<td>Industry-Recognized Certification, License and/or Early College Credit</td>
<td>Websites for Program Information (Additional Accommodations Information)</td>
<td>Testing Procedures/Accommodations</td>
<td>Maryland Certification Costs Costs may vary by state</td>
</tr>
<tr>
<td>----------------</td>
<td>-------------------------------</td>
<td>-------------------------------------------------</td>
<td>--------------------------------------------------</td>
<td>---------------------------------</td>
<td>---------------------------------------------------</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td></td>
</tr>
<tr>
<td>HB</td>
<td>AHP/CCMA</td>
<td>Specialty Course – Certified Clinical Medical Assistant</td>
<td>Pass the National HealthCareers CCMA Certification assessment</td>
<td><a href="http://www.nahnow.com">www.nahnow.com</a></td>
<td>$24 Fingerprinting: $20</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Program must be approved by the MD Board of Dental Examiners</td>
<td>Pass the Dental Assisting National Board of Radiation Health and Safety (RHS) and the MD General Exams (MDG). Certified to expose radiographs and in General Chairside procedures.</td>
<td><a href="http://www.dhmh.md.gov/dental">www.dhmh.md.gov/dental</a> <a href="http://www.dentalassisting.com">www.dentalassisting.com</a></td>
<td>$149 to take the CCMA exam - students who pass are awarded a provisional certificate until graduation from high school</td>
</tr>
<tr>
<td>HB</td>
<td>AHP/Dental Assisting</td>
<td>Program must be approved by the MD Board of Dental Examiners</td>
<td>Pass the Dental Assisting National Board of Radiation Health and Safety (RHS) and the MD General Exams (MDG). Certified to expose radiographs and in General Chairside procedures.</td>
<td><a href="http://www.dhmh.md.gov/dental">www.dhmh.md.gov/dental</a> <a href="http://www.dentalassisting.com">www.dentalassisting.com</a></td>
<td>$175 for the Radiation Health and Safety (RHS) exam $200 for MD General Chairside Exam Students should take both examinations</td>
</tr>
<tr>
<td>HB</td>
<td>PLTW Biomedical Science</td>
<td>BA degree(s) and at least two (2) college semesters of biology with lab experiences</td>
<td>Students are eligible to earn college credit from other PLTW affiliate colleges and universities with a score of 6 or better any of the end-of-course exams. Students are also eligible to earn 4 college credits from</td>
<td><a href="http://www.pltw.org">www.pltw.org</a> <a href="http://www.stevenson.edu/academics/schools/school-sciences/stem-initiatives/project-lead-the-way/">http://www.stevenson.edu/academics/schools/school-sciences/stem-initiatives/project-lead-the-way/</a></td>
<td>College certification process as set forth by PLTW and MSDE Fees are associated with the award of credit.</td>
</tr>
</tbody>
</table>
## ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study
### CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/ Accommodations</th>
<th>Maryland Certification Costs</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td>Costs may vary by state</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Human Resource Services (HRS)</strong></td>
<td>All programs should be affiliated with the Maryland Fire and Rescue Institute (MFRI)</td>
<td>Pass one of the following assessments:</td>
<td><a href="http://www.mfri.org">www.mfri.org</a></td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Fire Science (Maryland Fire and Rescue Institute - MFRI)</strong></td>
<td>MFRI instructors</td>
<td>- EMT,</td>
<td><a href="http://www.ets.org/portal/site/ets/menuitem">www.ets.org/portal/site/ets/menuitem</a>.</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>- EMR,</td>
<td><a href="http://www.americanheart.org">www.americanheart.org</a></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>- Fire Fighter I,</td>
<td><a href="http://www.redcross.org">www.redcross.org</a></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>- Firefighter II (must pass Firefighter I first),</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>- Rescue Tech – Site Operations,</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>- Rescue Technician – Vehicle and Machinery Extrication, or</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>- Haz-Mat Material Operations</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>The following colleges offer credit: Anne Arundel, Cecil, College of Southern Maryland, Frederick,</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>If program is affiliated with MFRI there is no cost to the student</td>
<td></td>
</tr>
</tbody>
</table>

Stevenson University for BIO 113 and BIO 113L by doing the following:
Completing the program, earning a GPA of 3.0 or higher in all courses, and receiving a score of 7 or better on the PLTW end-of-course assessments.
## ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study
CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td>Pass:</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td>- Must hold a MD Profess. Certificate</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td>- Hold a MA degree, MA equivalent or have 18 hrs toward MA</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td>- Three years of teaching and Recommend-ation from principal and/or supervisor</td>
</tr>
<tr>
<td>HRS</td>
<td>Teacher Academy of Maryland</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
<td>Pass:</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td>- ParaPro exam with a score of 455 OR</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td>- Praxis CORE (passing scores are: Reading – 156, Writing – 162, and Mathematics – 150) OR</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td>- SAT with a combined math and verbal (critical reading) score of 1100</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td></td>
</tr>
<tr>
<td>HRS</td>
<td>Early Childhood Education</td>
<td>Early Childhood Education</td>
<td>Child Development Associate</td>
<td>Child Development Associate (Candidates do not receive a pass or fail</td>
<td><a href="http://www.cdacouncil.org">http://www.cdacouncil.org</a></td>
</tr>
</tbody>
</table>
## ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study
### CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td>Information Technology (IT)</td>
<td>Database Academy (Oracle)</td>
<td>Oracle Academy</td>
<td>Oracle Certified Associate (OCA I)</td>
<td>Pass the OCA I exam</td>
<td>Online exam given at the end-of-course.</td>
</tr>
<tr>
<td>IT</td>
<td>IT Networking Academy</td>
<td>Cisco Academy</td>
<td>Teacher is certified through the Cisco program.</td>
<td>Pass either the:  * CompTIA A+  OR  * Cisco CCENT  Advanced students may also complete:  * Cisco CCNA (or)  * CompTIA Network+</td>
<td>Online exam given at the end-of-course.</td>
</tr>
<tr>
<td>IT</td>
<td>IT – Software-</td>
<td>Computer Science and Cyber</td>
<td>Program includes two AP courses</td>
<td>Pass one of the AP Computer Science Exams</td>
<td>The college Board - AP credit by exam</td>
</tr>
</tbody>
</table>

**Program and Teacher**
- Score on the CDA Exam and Verification Visit. Rather, the Council comprehensively evaluates how Candidates score in each of the thirteen CDA Functional Areas on the CDA Exam and during the CDA Verification Visit to make a credentialing decision.

**Recognition**
- Should submit the special accommodations request form with to the Council

**Child care facility**
- the Child Care Career and Professional Development Fund through MSDE

**Certification Costs**
- OCA I - $95 w/ a 40% discount
- OCA II - $125 w/ a 40% discount

**AP exam cost is $93 per exam.**
### ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study

**CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters**

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Security and alignment to industry certification through Microsoft</td>
<td>(Postsecondary credit varies by college)</td>
<td>OR Pass one of the Microsoft Technology Associate (MTA) – Developer Pathway Certification exams:</td>
<td>OR Software Development Fundamentals (Exam 98-361)</td>
</tr>
<tr>
<td>IT</td>
<td>PLTW Computer Science</td>
<td>Computer Science and Cyber Security</td>
<td>Pass the AP Computer Science Principles Exam (Postsecondary credit varies by college)</td>
<td><a href="https://apstudent.collegeboard.org/apcourse/ap-computer-science-principles">https://apstudent.collegeboard.org/apcourse/ap-computer-science-principles</a></td>
<td>The College Board - AP Computer Science Principles</td>
</tr>
<tr>
<td>Manufacturing Engineering &amp; Technology (MET)</td>
<td>Project Lead The Way (PLTW) Pathway to Engineering:</td>
<td>College Certification Process</td>
<td>Training Institute - 80 hr./course at a PLTW Affiliate Institution</td>
<td>Students can earn transcripted Engineering Technology credit through the Rochester Institute of Technology for passing the end-of-course exam with a</td>
<td><a href="http://www.pltw.org">http://www.pltw.org</a></td>
</tr>
</tbody>
</table>
### ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study
CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
</table>
| MET            | MET-NIMS                       | NIMS Accreditation and Credentialing Process                  | Students pass the Measurement, Materials & Safety exam and one of the following:  
  - Job Planning, Benchwork & Layout  
  - Manual Milling Skills I  
  - Turning Operations: Turning Between | All areas except Measurement, Materials and Safety (MMS) have both a performance and a theory exam. MMS only has a theory exam. | $1500 + $40 Lifetime Registration fee for each teacher Two tests are required. Only the theory exam has a cost associated with it. Students pay a one-time registration fee of $40. Students from accredited programs pay $1500 for the program. |

Stanine score of 6/9 or better on any of the following PLTW courses: IED, POE, DE, CIM, and CEA.

Students are also eligible to earn college credit from UMBC for ENES 100 by doing the following: Pass five of the PLTW Engineering Courses, including IED, POE, & EDD. Receive a Stanine score of 6/9 or better on the PLTW end of course exams, and submit the EDD portfolio to UMBC for review.

RIT = $225 per course for students with a Stanine score of 6 or better on the PLTW end-of-course assessments.
<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program Teacher Student</td>
<td></td>
<td></td>
<td>Program Student</td>
</tr>
<tr>
<td></td>
<td></td>
<td>they instruct. Centers</td>
<td></td>
<td></td>
<td>$28/exam (2 exams @ $28 = $56 + $40 registration fee = $96)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Turning Operations: Turning Chucking Skills</td>
<td></td>
<td></td>
<td>Students from non-accredited programs pay $35/exam (2 exams @ $35 = $70 + $40 registration fee = $110)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Grinding Skills I</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Drill Press Skills I</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>CNC Turning: Programming Setup &amp; Operations</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>CNC Milling: Programming Setup &amp; Operations</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>CNC Turning: Operations</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>CNC Milling: Operations</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Students who earn NIMS certification are eligible for articulated credit in the manufacturing programs at the Community College of Baltimore County.

Transportation Technologies (TT) Automotive Technology National Automotive Technology Education Foundation (NATEF) Automotive Automotive Service Excellence (ASE) Pass one of the following ASE Student Certification exams: Suspension and Steering, Brakes, www.NA3SA.com www.natef.org www.ayes.org National Automotive Student Skills Standard Assessment NATEF Estimated costs: Initial: $1,269 Recertification: $917 AYES affiliation $30 per student per academic year. The fee allows for two tests during the test windows.
<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program: Service Excellence (ASE)</td>
<td>pass one of the following ASE Student Certification exams:</td>
<td>At end-of-course</td>
<td>n/a</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Teacher: • Electrical/ Electronic Systems,</td>
<td>• Painting and Refinishing OR</td>
<td>Contact Wanda Bloomer at NATEF.</td>
<td>NATEF Estimated costs: Initial: $1,269</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Student: • Engine Performance,</td>
<td>• Structural Analysis and Damage Repair.</td>
<td>800-362-0544 three weeks prior</td>
<td>Recertification $917</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Early College Credit:</td>
<td></td>
<td>In-house accommodations can be provided.</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>NA3SA is built with extended time.</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>TT</td>
<td>Autobody Collision Repair Technician</td>
<td>National Automotive Technology Education Foundation (NATEF) Automotive Service Excellence (ASE)</td>
<td><a href="http://www.NA3SA.com">www.NA3SA.com</a> <a href="http://www.natef.org">www.natef.org</a> <a href="http://www.ayes.org">www.ayes.org</a></td>
<td></td>
<td><a href="http://www.natef.org">www.natef.org</a></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>$30 per student per academic year. The fee allows for two tests during the testing windows.</td>
</tr>
</tbody>
</table>
### ATTACHMENT 2B: Maryland Career and Technology Education Programs of Study CCR-CCA of 2013 - Technical Skill Assessment Chart by Career Clusters

<table>
<thead>
<tr>
<th>Career Cluster</th>
<th>Maryland CTE Programs of Study</th>
<th>Industry-Recognized Certification, License and/or Early College Credit</th>
<th>Websites for Program Information (Additional Accommodations Information)</th>
<th>Testing Procedures/Accommodations</th>
<th>Maryland Certification Costs Costs may vary by state</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Program</td>
<td>Teacher</td>
<td>Student</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>SkillsUSA Transcribed credit available at Penn College of Technology</td>
</tr>
<tr>
<td>TT</td>
<td>Auto body/ Collision Repair Technician</td>
<td>I-CAR (Inter-Industry Conference on Auto Collision Repair)</td>
<td>Pass the I-CAR Platinum exam. Transcribed credit available at Penn College of Technology</td>
<td><a href="https://www.i-car.com/Home/Career-Technical-Schools">https://www.i-car.com/Home/Career-Technical-Schools</a></td>
<td>$1,100/school</td>
</tr>
<tr>
<td>TT</td>
<td>Medium-Heavy Truck</td>
<td>National Automotive Technology Education Foundation (NATEF) Automotive Service Excellence (ASE)</td>
<td>Pass the Diesel Engines ASE Student Certification exam Developed by ASE in partnership with AYES, NATEF, and SkillsUSA Transcribed credit available at Penn College of Technology</td>
<td><a href="http://www.na3sa.com">www.NA3SA.com</a> <a href="http://www.natef.org">www.natef.org</a> <a href="http://www.ayes.org">www.ayes.org</a> Contact Wanda Bloomer at NATEF. 800-362-0544 three weeks before the test In-house accommodations can be provided. NA3SA is built with extended time.</td>
<td>NATEF Estimated Costs: Initial: $1,269 Recertification $917 $30 per student per academic year. The fee allows for a single attempt at any or all tests in a series.</td>
</tr>
</tbody>
</table>
English/Language Arts Credit, Enrollment and Assessment Requirements for Each Graduating Class from 2017-2020

Please refer questions to:

Ms. Ava B. Spencer
Coordinator of English Language Arts
Maryland State Department of Education
Division of Curriculum, Assessment and Accountability
Telephone: 410.767.0830
Email: ava.spencer@maryland.gov
## MSDE English Language Arts (ELA) Credit, Enrollment and Assessment Requirements

### Graduating Class of 2017 (Students entering 9th Grade during the 2013/2014 School Year)

<table>
<thead>
<tr>
<th>School Year</th>
<th>Grade</th>
<th>MSDE ELA Graduation Requirements</th>
<th>Additional ELA Requirements put into law by the College and Career Readiness and College Completion Act of 2013 (CCR)</th>
<th>12th Grade Transition Course</th>
</tr>
</thead>
<tbody>
<tr>
<td>2013/2014</td>
<td>9th</td>
<td>Students must earn 4 credits in English Language Arts.</td>
<td>Students must be assessed by the end of the 11th grade to determine readiness for credit-bearing college-level coursework, using one of the following:</td>
<td>Students not designated college and career ready by the end of the 11th grade must participate in one of the following options:</td>
</tr>
</tbody>
</table>
| 2014/2015     | 10th  | Students must have participated in PARCC 10 assessment. | PARCC 11  
  o Score of Level 4 or 5  
  PARCC 10  
  o At this time, a score of Level 4 or 5 satisfies the CCR determination (pending further research).  
  A score of Level 1, 2, or 3 on either the PARCC 10 or 11 does not constitute CCR designation.  
  SAT  
  o Score of 500 or higher on Evidenced-based Reading and Writing (EBRW) Section  
  ACT  
  o Score of 21 or higher (Average of English and Reading scores)  
  AP Lit & Comp or AP Lang & Comp  
  o Score of 3, 4, or 5  
  IB Language A: Literature SL or HL, or IB Language A: Language & Literature SL or HL  
  o Score of 4, 5, 6, or 7  
  Accuplacer  
  o Score of 79+ Reading, 6+ Writing, and 90+ Sentence Skills  
  Dual enrollment  
  o Admission to and enrollment in a Maryland IHE’s appropriate ELA college credit bearing course |  
  Next ELA course in the sequence with support by adding additional time and additional content addressed, or  
  ELA transition course, or  
  Transition course articulated with a college, or  
  Other ELA instructional opportunity, such as:  
  o ELA module  
  o Online ELA course  
  o Hybrid ELA course |
| 2015/2016     | 11th  | English Bridge Project requirement is waived for students in this cohort. |  
  CCR Assessment Options include all of the CCR Assessment Options listed in the column to the left. Additional senior year CCR reassessment options include:  
  • Summative Assessment aligned to the ELA Transition Course articulated by a college, or  
  • Career and Technology Education Program Technical Skills Assessment that qualifies students to earn college credit or leads to a license or an industry certification. |
| 2016/2017     | 12th  |  |  |  |

Students who were not designated college and career ready by the end of the 11th grade must be reassessed by the end of the senior year. Reassessment options include all of the CCR Assessment Options listed in the column to the left. Additional senior year CCR reassessment options include:

- Summative Assessment aligned to the ELA Transition Course articulated by a college, or
- Career and Technology Education Program Technical Skills Assessment that qualifies students to earn college credit or leads to a license or an industry certification.
## MSDE English Language Arts (ELA) Credit, Enrollment and Assessment Requirements

<table>
<thead>
<tr>
<th>School Year</th>
<th>Grade</th>
<th>MSDE ELA Graduation Requirements</th>
<th>Additional ELA Requirements put into law by the College and Career Readiness &amp; and College Completion Act of 2013 (CCR)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2014/2015</td>
<td>9&lt;sup&gt;th&lt;/sup&gt;</td>
<td>Students must earn 4 credits in English Language Arts.</td>
<td>Students must be assessed by the end of the 11&lt;sup&gt;th&lt;/sup&gt; grade to determine readiness for credit-bearing college-level coursework, using one of the following:</td>
</tr>
<tr>
<td>2015/2016</td>
<td>10&lt;sup&gt;th&lt;/sup&gt;</td>
<td>Students must have participated in PARCC 10 assessment.</td>
<td>PARCC 11</td>
</tr>
<tr>
<td>2016/2017</td>
<td>11&lt;sup&gt;th&lt;/sup&gt;</td>
<td>English Bridge Project requirement is waived for students in this cohort.</td>
<td>PARCC 10</td>
</tr>
<tr>
<td>2017/2018</td>
<td>12&lt;sup&gt;th&lt;/sup&gt;</td>
<td></td>
<td>Unless otherwise decided, a score of Level 4 or 5 satisfies the CCR determination (pending further research).</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>A score of Level 1, 2, or 3 on either the PARCC 10 or 11 does not constitute CCR designation.</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>SAT</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>ACT</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>AP Lit &amp; Comp or AP Lang &amp; Comp</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>IB Language A: Literature SL or HL, or IB Language A: Language &amp; Literature SL or HL</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Accuplacer</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Dual enrollment</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Students not designated college and career ready by the end of the 11&lt;sup&gt;th&lt;/sup&gt; grade must participate in one of the following options:</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>• Next ELA course in the sequence with support by adding additional time and additional content addressed, or</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>• ELA transition course, or</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>• Transition course articulated with a college, or</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>• Other ELA instructional opportunity, such as:</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>o ELA module</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>o Online ELA course</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>o Hybrid ELA course</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Students who were not designated college and career ready by the end of the 11&lt;sup&gt;th&lt;/sup&gt; grade must be reassessed by the end of the senior year. Reassessment options include all of the CCR Assessment Options listed in the column to the left. Additional senior year CCR reassessment options include:</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>• Summative Assessment aligned to the ELA Transition Course articulated by a college, or</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>• Career and Technology Education Program Technical Skills Assessment that qualifies students to earn college credit or leads to a license or an industry certification.</td>
</tr>
</tbody>
</table>
# MSDE English Language Arts (ELA) Credit, Enrollment and Assessment Requirements

## Graduating Class of 2019 (Students entering 9th Grade during the 2015/2016 School Year)

<table>
<thead>
<tr>
<th>School Year</th>
<th>Grade</th>
<th>MSDE ELA Graduation Requirements</th>
<th>Additional ELA Requirements put into law by the College and Career Readiness and College Completion Act of 2013 (CCR)</th>
</tr>
</thead>
</table>
| 2015/2016   | 9th   | Students must earn 4 credits in English Language Arts. | Students not designated college and career ready by the end of the 11th grade must participate in one of the following options:  
  - Next ELA course in the sequence with support by adding additional time and additional content addressed, or  
  - ELA transition course, or 
  - Transition course articulated with a college, or  
  - Other ELA instructional opportunity, such as:  
    - ELA module 
    - Online ELA course 
    - Hybrid ELA course |
| 2016/2017   | 10th  | Students must pass PARCC 10 assessment with a score TBD. | Students who were not designated college and career ready by the end of the 11th grade must be reassessed by the end of the senior year. Reassessment options include all of the CCR Assessment Options listed in the column to the left. Additional senior year CCR reassessment options include:  
  - Summative Assessment aligned to the ELA Transition Course articulated by a college, or  
  - Career and Technology Education Program Technical Skills Assessment that qualifies students to earn college credit or leads to a license or an industry certification. |
| 2017/2018   | 11th  | If the Grade 10 PARCC graduation requirement is not met after two attempts, the student will submit an English Bridge Project. |  |
| 2018/2019   | 12th  | Students must be assessed by the end of the 11th grade to determine readiness for credit-bearing college-level coursework, using one of the following:  
  - PARCC 11  
    - Score of Level 4 or 5  
  - PARCC 10  
    - Unless otherwise decided, a score of Level 4 or 5 satisfies the CCR determination (pending further research).  
    - A score of Level 1, 2, or 3 on either the PARCC 10 or 11 does not constitute CCR designation.  
  - SAT  
    - Score of 500 or higher on Evidenced-based Reading and Writing (EBRW) Section  
  - ACT  
    - Score of 21 or higher (Average of English and Reading scores)  
  - AP Lit & Comp or AP Lang & Comp  
    - Score of 3, 4, or 5  
  - IB Language A: Literature SL or HL, or IB Language A: Language & Literature SL or HL  
    - Score of 4, 5, 6, or 7  
  - Accuplacer  
    - Score of 79+ Reading, 6+ Writing, and 90+ Sentence Skills  
  - Dual enrollment  
    - Admission to and enrollment in a Maryland IHE’s appropriate ELA college credit bearing course |
## MSDE English Language Arts (ELA) Credit, Enrollment and Assessment Requirements

### Graduating Class of 2020 (Students entering 9th Grade during the 2016/2017 School Year)

<table>
<thead>
<tr>
<th>School Year</th>
<th>Grade</th>
<th>MSDE ELA Graduation Requirements</th>
<th>Additional ELA Requirements put into law by the College and Career Readiness and College Completion Act of 2013 (CCR)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2016/2017</td>
<td>9th</td>
<td>Students must earn 4 credits in English Language Arts.</td>
<td>CCR Assessment Options: 12th Grade Transition Course</td>
</tr>
</tbody>
</table>
| 2017/2018   | 10th  | Students must pass PARCC 10 assessment with a score TBD. If the Grade 10 PARCC graduation requirement is not met after two attempts, the student will submit an English Bridge Project. | Students must be assessed by the end of the 11th grade to determine readiness for credit-bearing college-level coursework, using one of the following:  
- PARCC 11  
  - Score of Level 4 or 5  
- PARCC 10  
  - Unless otherwise decided, a score of Level 4 or 5 satisfies the CCR determination (pending further research).  
  - A score of Level 1, 2, or 3 on either the PARCC 10 or 11 does not constitute CCR designation. |
| 2018/2019   | 11th  | Students must be assessed by the end of the 11th grade to determine readiness for credit-bearing college-level coursework, using one of the following:  
- SAT  
  - Score of 500 or higher on Evidence-based Reading and Writing (EBRW) Section  
- ACT  
  - Score of 21 or higher (Average of English and Reading scores)  
- AP Lit & Comp or AP Lang & Comp  
  - Score of 3, 4, or 5  
- IB Language A: Literature SL or HL, or  
  - IB Language A: Language & Literature SL or HL  
  - Score of 4, 5, 6, or 7  
- Accuplacer  
  - Score of 79+ Reading, 6+ Writing, and 90+ Sentence Skills  
- Dual enrollment  
  - Admission to and enrollment in a Maryland IHE’s appropriate ELA college credit bearing course |
| 2019/2020   | 12th  | Students not designated college and career ready by the end of the 11th grade must participate in one of the following options:  
- Next ELA course in the sequence with support by adding additional time and additional content addressed, or  
- ELA transition course, or  
- Transition course articulated with a college, or  
- Other ELA instructional opportunity, such as:  
  - ELA module  
  - Online ELA course  
  - Hybrid ELA course |

Students who were not designated college and career ready by the end of the 11th grade must be reassessed by the end of the senior year. Reassessment options include all of the CCR Assessment Options listed in the column to the left. Additional senior year CCR reassessment options include:  
- Summative Assessment aligned to the ELA Transition Course articulated by a college, or  
- Career and Technology Education Program Technical Skills Assessment that qualifies students to earn college credit or leads to a license or an industry certification.
Mathematics Credit, Enrollment and Assessment Requirements for Each Graduating Class from 2017–2020

Please refer questions to:

Ms. Debra L. Ward  
Coordinator of Mathematics  
Maryland State Department of Education  
Division of Curriculum, Assessment and Accountability  
Telephone: 410.767.0355  
Email: debra.ward@maryland.gov
## Maryland Mathematics Credit, Enrollment and Assessment Requirements

<table>
<thead>
<tr>
<th>School Year</th>
<th>Grade</th>
<th>Mathematics Graduation Requirements for Public High Schools in Maryland</th>
<th>Additional Mathematics Requirements put into law as a result of the College and Career Readiness and College Completion Act of 2013 (CCR)</th>
</tr>
</thead>
</table>
| 2013/2014   | 9th   | Students must earn 3 credits in mathematics which must include a credit in: Algebra, Geometry. Maryland’s goal for all students is completion of Algebra II but completion of Algebra II is not a mathematics graduation credit requirement. | Students not designated college and career ready by the end of the 11th grade must participate in one of the following options:  
- Next mathematics course in the sequence with support, or  
- Transition course articulated with a college, or  
- Other mathematics instructional opportunity:  
  - Modules  
  - Online Mathematics course  
  - Hybrid Mathematics Course  
Students who were not designated as college and career ready by the end of the 11th grade must be reassessed by the end of the senior year. Additional CCR reassessment options include:  
- Summative Assessment aligned to the Mathematics Transition Course articulated with a college, or  
- Career and Technology Education Program Technical Skills Assessment that qualifies students to earn college credit or leads to a license or an industry certification. |
| 2014/2015   | 10th  | Students must have participated in the Algebra/ Data Analysis HSA. Algebra/Data Analysis Bridge Project requirement is waived for this cohort. |  
| 2015/2016   | 11th  |  
| 2016/2017   | 12th  | |  

### CCR Assessment Options

- PARCC Algebra II  
  - Score of 4 or 5  
- (Pending further research) For 11th graders enrolled in Geometry, a score of Level 4 or 5 on PARCC Geometry satisfies the CCR determination.  
- SAT  
  - Score of 500 or higher on the Mathematics portion  
- ACT  
  - Score of 21 or higher on Mathematics portion  
- AP Calculus AB, AP Calculus BC, AP Statistics  
  - Score of 3, 4 or 5  
- IB Mathematics  
  - Score of 4,5,6,or 7  
- Accuplacer  
  - College Level Mathematics test  
    - Score of 45 or higher  
- Dual enrollment  
  - Admission to and enrollment in a Maryland IHE’s appropriate mathematics college credit bearing course  
  
Note: LEAs may use alternate CCR assessment options, if an agreement exists between the LEA and a local community college that allows students to take college-level credit-bearing mathematics coursework using different metrics.

---

1 The Mathematics Admissions requirements for schools in the University System of Maryland exceed the Maryland Mathematics Graduation Requirements. (See details below.)

The University System of Maryland (USM) Board of Regents in December 2009 approved a new academic policy that requires incoming freshman undergraduates to have completed four years of high school math. The requirement applies to student applicants who entered ninth grade in Fall 2011 (Seniors during 2014-2015). The coursework must include Algebra I, Geometry, and Algebra II. Students who complete Algebra II before their senior year must also complete the fourth-year math requirement. They can do so by taking a course during their senior year that is intensive in algebra and expands on algebra foundations developed during Algebra II.

The University System of Maryland is comprised of: Bowie State University; Coppin State University; Frostburg State University; Salisbury University; Towson University; University of Maryland, Baltimore; University of Maryland, Baltimore County; University Center for Environmental Science; University of Maryland, College Park; University of Maryland, Eastern Shore; University of Maryland, University College; and University of Baltimore.

2 Districts may use the PARCC Geometry assessment as a means to satisfy the CCR assessment requirement for 11th grade students taking Geometry. Please note that a score of 4 or 5 the PARCC Geometry assessment does not indicate readiness for college-level credit-bearing mathematics coursework.
## Graduating Class of 2018 (Students entering 9th Grade during the 2014/2015 School Year)

<table>
<thead>
<tr>
<th>School Year</th>
<th>Grade</th>
<th>Mathematics Graduation Requirements for Public High Schools in Maryland</th>
<th>Assessment Requirements</th>
<th>Additional Mathematics Requirements put into law as a result of the College and Career Readiness and College Completion Act of 2013 (CCR)</th>
<th>CCR Assessment Options</th>
<th>12th Grade Transition Course</th>
</tr>
</thead>
<tbody>
<tr>
<td>2014/2015</td>
<td>9th</td>
<td>Students must earn 3 credits in mathematics which must include a credit in: Algebra, Geometry</td>
<td>PARCC Algebra I assessment</td>
<td>Students must be assessed by the end of the 11th grade to determine readiness for credit bearing college level coursework, using one of the following: PARCC Algebra II o Score of 4 or 5 (Pending further research) For 11th graders enrolled in Geometry, a score of Level 4 or 5 on PARCC Geometry may satisfy the CCR determination. SAT o Score of 500 or higher on the Mathematics portion ACT o Score of 21 or higher on Mathematics portion AP Calculus AB, AP Calculus BC, AP Statistics, o Score of 3, 4 or 5 IB Mathematics o Score of 4, 5, 6, or 7 Accuplacer o College Level Mathematics test Score of 45 or higher Dual enrollment o Admission to and enrollment in a Maryland IHE’s appropriate mathematics college credit bearing course Note: LEAs may use alternate CCR assessment options, if an agreement exists between the LEA and a local community college that allows students to take college-level credit-bearing mathematics coursework using different metrics.</td>
<td>Students not designated college and career ready by the end of the 11th grade must participate in one of the following options: Next mathematics course in the sequence with support, or Transition course articulated with a college, or Other mathematics instructional opportunity: Module Online Mathematics Course Hybrid Mathematics Course</td>
<td>Students who were not designated as college and career ready by the end of the 11th grade must be reassessed by the end of the senior year. Additional CCR reassessment options include: Summative Assessment aligned to the Mathematics Transition Course articulated with a college, or Career and Technology Education Program Technical Skills Assessment that qualifies students to earn college credit or leads to a license or an industry certification.</td>
</tr>
<tr>
<td>2015/2016</td>
<td>10th</td>
<td>Enrollment in a mathematics course during 12th grade is required. Note the University System of Maryland (USM) Mathematics Admission Requirements related to the completion of Algebra II in the footnote below.</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2016/2017</td>
<td>11th</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2017/2018</td>
<td>12th</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

---

1 The Mathematics Admissions requirements for schools in the University System of Maryland exceed the MARYLAND Mathematics Graduation Requirements. (see details below) The University System of Maryland (USM) Board of Regents in December 2009 approved a new academic policy that requires incoming freshman undergraduates to have completed four years of high school math. The requirement applies to student applicants who entered ninth grade in Fall 2011 (Seniors during 2014-2015). The coursework must include Algebra I, Geometry, and Algebra II. Students who complete Algebra II before their senior year must also complete the fourth-year math requirement. They can do so by taking a course during their senior year that is intensive in algebra and expands on algebra foundations developed during Algebra II.

The University System of Maryland is comprised of: Bowie State University; Coppin State University; Frostburg State University; Salisbury University; Towson University; University of Maryland, Baltimore; University of Maryland, Baltimore County; University Center for Environmental Science; University of Maryland, College Park; University of Maryland, Eastern Shore; University of Maryland, University College; and University of Baltimore.

2 Unless otherwise determined, districts may use the PARCC Geometry assessment as a means to satisfy the CCR assessment requirement for 11th grade students taking Geometry. Please note that a score of 4 or 5 the PARCC Geometry assessment does not indicate readiness for college-level credit-bearing mathematics coursework.

---

## Graduating Class of 2019 (Students entering 9th Grade during the 2015/2016 School Year)

29
## Mathematics Graduation Requirements for Public High Schools in Maryland

<table>
<thead>
<tr>
<th>School Year</th>
<th>Grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>2015/2016</td>
<td>9th</td>
</tr>
<tr>
<td>2016/2017</td>
<td>10th</td>
</tr>
<tr>
<td>2017/2018</td>
<td>11th</td>
</tr>
<tr>
<td>2018/2019</td>
<td>12th</td>
</tr>
</tbody>
</table>

### Credit Requirements
- Students must earn 3 credits in mathematics which must include a credit in:
  - Algebra
  - Geometry

### Assessment Requirements
- PARCC Algebra I assessment

**Note:** Students who took the PARCC Algebra I assessment during the 2014/2015 or 2015/2016 school year only needed to participate in the assessment to satisfy their Maryland Mathematics Assessment graduation requirement.

### Additional Mathematics Requirements put into law as a result of College and Career Readiness and College Completion Act of 2013 (CCR)

**CCR Assessment Options**
- Students must be assessed by the end of the 11th grade to determine readiness for credit bearing college level coursework, using one of the following:
  - PARCC Algebra II
    - Score of 4 or 5
  - (Pending further research) For 11th graders enrolled in Geometry, a score of Level 4 or 5 on PARCC Geometry may satisfy the CCR determination.
  - SAT
    - Score of 500 or higher on the Mathematics portion
  - ACT
    - Score of 21 or higher on Mathematics portion
  - AP Calculus AB, AP Calculus BC, AP Statistics
    - Score of 3, 4 or 5
  - IB Mathematics
    - Score of 4,5,6,or 7
  - Accuplacer
    - College Level Mathematics test
      - Score of 45 or higher
  - Dual enrollment
    - Admission to and enrollment in a Maryland IHE’s appropriate mathematics college credit bearing course

**12th Grade Transition Course**
- Students not designated college and career ready by the end of the 11th grade must participate in one of the following options:
  - Next mathematics course in the sequence with support, or
  - Transition course articulated with a college, or
  - Other mathematics instructional opportunity:
    - Modules
    - Online Mathematics course
    - Hybrid Mathematics Course

**Additional Mathematics Requirements**
- Students who were not designated college and career ready by the end of the 11th grade must be reassessed by the end of the senior year. Additional CCR reassessment options include:
  - Summative Assessment aligned to the Mathematics Transition Course articulated with a college, or
  - Career and Technology Education Program Technical Skills Assessment that qualifies students to earn college credit or leads to a license or an industry certification.

---

*The Mathematics Admissions requirements for schools in the University System of Maryland exceed the Maryland Mathematics Graduation Requirements.* (see details below)

The University System of Maryland (USM) Board of Regents in December 2009 approved a new academic policy that requires incoming freshman undergraduates to have completed four years of high school math. The requirement applies to student applicants who entered ninth grade in Fall 2011 (Seniors during 2014-2015). The coursework must include Algebra I, Geometry, and Algebra II. Students who complete Algebra II before their senior year must also complete the fourth-year math requirement. They can do so by taking a course during their senior year that is intensive in algebra and expands on algebra foundations developed during Algebra II.

The University System of Maryland is comprised of: Bowie State University; Coppin State University; Frostburg State University; Salisbury University; Towson University; University of Maryland, Baltimore; University of Maryland, Baltimore County; University Center for Environmental Science; University of Maryland, College Park; University of Maryland, Eastern Shore; University of Maryland, University College, and University of Baltimore.

1 Unless otherwise determined, districts may use the PARCC Geometry assessment as a means to satisfy the CCR assessment requirement for 11th grade students taking Geometry. Please note that a score of 4 or 5 the PARCC Geometry assessment does not indicate readiness for college-level credit-bearing mathematics coursework.
### Maryland Mathematics Credit, Enrollment and Assessment Requirements

<table>
<thead>
<tr>
<th>Graduating Class of 2020 (Students entering 9th Grade during the 2016/2017 School Year)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>School Year</strong></td>
</tr>
</tbody>
</table>
| 2016/2017 | 9th | Students must earn 3 credits in mathematics which must include a credit in:  
- Algebra  
- Geometry  
Maryland’s goal for all students is completion of Algebra II but completion of Algebra II is not a Maryland mathematics credit requirement.  
Enrollment in a mathematics course during 12th grade is required.  
**Note the University System of Maryland (USM) Mathematics Admission Requirements related to the completion of Algebra II in the footnote below.**  
**PARCC Algebra I assessment**  
**Students must receive a passing score TBD or complete a PARCC Algebra I Bridge Project**  
**Note: Students who took the PARCC Algebra I assessment during the 2014/2015 or 2015/2016 school year only needed to participate in the assessment to satisfy their Maryland Mathematics Assessment graduation requirement.** | Students must be assessed by the end of the 11th grade to determine readiness for credit bearing college level coursework, using one of the following:  
- PARCC Algebra II  
  - Score of 4 or 5  
- (Pending further research) For 11th graders enrolled in Geometry, a score of Level 4 or 5 on PARCC Geometry may satisfy the CCR determination.  
- SAT  
  - Score of 500 or higher on the Mathematics portion  
- ACT  
  - Score of 21 or higher on Mathematics portion  
- AP Calculus AB, AP Calculus BC, AP Statistics  
  - Score of 3, 4 or 5  
- IB Mathematics  
  - Score of 4,5,6,or 7  
- Accuplacer  
  - College Level Mathematics test  
  - Score of 45 or higher  
- Dual enrollment  
  - Admission to and enrollment in a Maryland IHE’s appropriate mathematics college credit bearing course  
**Note: LEAs may use alternate CCR assessment options, if an agreement exists between the LEA and a local community college that allows students to take college-level credit-bearing mathematics coursework using different metrics.** | Students not designated college and career ready by the end of the 11th grade must participate in one of the following options:  
- Next mathematics course in the sequence with support, or  
- Transition course articulated with a college, or  
- Other mathematics instructional opportunity:  
  - Modules  
  - Online Mathematics course  
  - Hybrid Mathematics Course  | **Students who were not designated as college and career ready by the end of the 11th grade must be reassessed by the end of the senior year. Additional CCR reassessment options include:**  
- **Summative Assessment aligned to the Mathematics Transition Course articulated with a college, or**  
- **Career and Technology Education Program Technical Skills Assessment that qualifies students to earn college credit or leads to a license or an industry certification.** |
| 2017/2018 | 10th | | | |
| 2018/2019 | 11th | | | |
| 2019/2020 | 12th | | | |

---

1. The Mathematics Admissions requirements for schools in the University System of Maryland exceed the Maryland Mathematics Graduation Requirements. (see details below)

The University System of Maryland (USM) Board of Regents in December 2009 approved a new academic policy that requires incoming freshman undergraduates to have completed four years of high school math. The requirement applies to student applicants who entered ninth grade in Fall 2011 (Seniors during 2014-2015). The coursework must include Algebra I, Geometry, and Algebra II. Students who complete Algebra II before their senior year must also complete the fourth-year math requirement. They can do so by taking a course during their senior year that is intensive in algebra and expands on algebra foundations developed during Algebra II.

The University System of Maryland is comprised of: Bowie State University; Coppin State University; Frostburg State University; Salisbury University; Towson University; University of Maryland, Baltimore; University of Maryland, Baltimore County; University Center for Environmental Science; University of Maryland, College Park; University of Maryland, Eastern Shore; University of Maryland, University College; and University of Baltimore.

2. Unless otherwise determined, districts may use the PARCC Geometry assessment as a means to satisfy the CCR assessment requirement for 11th grade students taking Geometry. Please note that a score of 4 or 5 on the PARCC Geometry assessment does not indicate readiness for college-level credit-bearing mathematics coursework.
This page intentionally left blank
Frequently Asked Questions

English Language Arts (ELA)
Credit, Enrollment and Assessment Requirements

Please refer questions to:

Ms. Ava B. Spencer
Coordinator of English Language Arts
Maryland State Department of Education
Division of Curriculum, Assessment and Accountability
Telephone: 410.767.0830
Email: ava.spencer@maryland.gov
MSDE ELA Graduation Requirements

Questions Related to:
Maryland Education Article, Annotated Code of Maryland
§ 7-205.1. High school curriculum and graduation requirements
(b) Assessment of students; transition and other courses  Section (2) (ii) states:
“The implementation of transition courses or other instructional opportunities required under subparagraph (i) of this paragraph:
1. Shall include an assessment or reassessment of the student after completion of the course; and
2. May not preclude or replace enrollment in a course otherwise required for graduation from high school.”

(1). Question:
Does a senior, deemed not college and career ready in ELA via a CCR assessment administered at the end of the 11th grade, need to enroll in an ELA transition course during the senior year if enrollment in the transition course would preclude the student from taking a course required for graduation?
Answer:
No, if there is no room for additional courses in a student’s school schedule, then the student is not required to enroll in an English transition course in the 12th grade.

(2). Question:
Does a senior, deemed not college and career ready in ELA via a CCR assessment administered at the end of the 11th grade, need to be provided other instructional opportunities beyond the school day in order to satisfy the requirements of the law, if the student cannot fit a transition course into his/her schedule?
Answer:
No, transition courses or other instructional opportunities should take place during the regular school day. The statute states that a transition course may not "replace" a course needed to graduate. Thus, if a student needs credits in English Language Arts or in math to graduate, transition courses in those content areas cannot be used to fulfill the regular English Language Arts or math credits needed to graduate. The transition course or instructional opportunity must be in addition to the English or math course needed for graduation, by adding time spent and content addressed.

The statute states that a transition course may not "preclude" enrollment in a course needed to graduate. Thus, if a student needs specific courses to graduate, and s/he cannot fit those courses and a transition course into his schedule, s/he need not take the transition course. A transition course cannot get in the way of a student completing his regular graduation credit requirements.
Question Related to:
COMAR Regulation 13A.03.02.09 Diplomas and Certificates section B. (3)(c)

B. Maryland High School Diploma. Except as provided in Regulation 12 of this chapter, and in section C of this regulation, to be awarded a Maryland high school diploma a student shall:

(3) Satisfy one of the following:
(c) Achieve a score as established by the department on department-approved substitute assessment for algebra, biology, English, and Government, aligned with the Maryland High School Assessments such as Advanced Placement examinations, SAT I, SAT II, ACT, and International Baccalaureate examinations;

(3). Question:
Can a student satisfy the English assessment graduation requirement using a means other than by earning a passing score on the Maryland High School Assessment for English or by successfully completing an English Bridge Plan?

Answer:
Yes, according to The Code of Maryland Regulations (COMAR) 13A.03.02.09.B.(3)(c), students can satisfy their English assessment graduation requirement using other exams approved by the MSDE including Advanced Placement (AP) English Language or English Literature score of 3, 4, or 5; or International Baccalaureate (IB) English A1 score of 5, 6, or 7.

Additional ELA Requirements put into law by the College and Career Readiness and College Completion Act of 2013 (CCR)

General CCR Questions:

(4). Question:
Community colleges require students to earn a score of 79+ on the Reading, 6+ on the Writing, and 90+ on the Sentence Skills College-level English Accuplacer or a score of 500 or higher on the Evidence-based Reading and Writing (EBRW) Section of the SAT before being permitted to take a college level credit bearing English course. If a community college allows a high school student to take a college-level credit bearing English course, is the student considered to be college and career ready?

Answer:
Yes, if a community college allows a student to take a college level credit bearing English course, it means that the student has achieved either a score of 79+ on the Reading, 6+ on the Writing, and 90+ on the Sentence Skills College-level English Accuplacer or a score of 500 or higher on the Evidence-based Reading and Writing (EBRW) Section of the SAT. These are scores districts use for CCR designation in English as well; however, taking and successfully completing a non-credit developmental English course at a community college does not necessarily mean a student is college and career ready. Community colleges have several levels of developmental English courses. A student would need to complete successfully the highest level non-credit developmental course to be designated as CCR.

(5). Question:
Dual enrollment is listed as an option for Grade 11 Assessment, but is it dual enrollment for students completing a course in Grade 11 or 12? If the course is in lieu of another assessment, could an 11th grader take the credit bearing course in the summer before Junior or Senior year and have the class count?
Answer:
Prior credit bearing coursework can count toward the CCR determination. An example of possible justification would be students who do not test well but are successful in the course.

(6). Question:
Who will oversee the testing and the collection of data? If the plan includes the next course in the sequence with support (as indicated on the MSDE English Language Arts [ELA] and Mathematics Credit, Enrollment and Assessment Requirements charts), how will this information be gathered and analyzed?

Answer:
Beginning in the 2017 school year, MSDE will collect information on transition and module courses, and reassessments through the Maryland Course Catalog (MCC), Student-Course-Grade-Teacher (SCGT), High School Status and Completers (HSSC) data collections. The MCC data collection will gather the transition courses and modules offered by subject area in each LEA. The SCGT data collection will collect information on individual students taking and passing transition courses or modules. The HSSC data collection will collect information on students as they exit Maryland public high schools including their College and Career Readiness designation, any transition courses or modules, and reassessments.

(7). Question:
Under what circumstances, if any, can a student be exempt from taking a Transition Course?

Answer:
A student who has a schedule that is already full with courses required for graduation, and has no room for additional courses in his/her schedule, is exempt from taking the transition course.

(8). Question:
CCR 12th grade reassessment options include the SAT and Advanced Placement English exams. Results from Advanced Placement Exams typically become available after schools have dismissed for the summer. Depending on when a 12th grade student takes the SAT, the results may also not be available until after schools dismiss for the summer. How will a student learn of their CCR designation if the CCR assessment results are not available until the summer?

Answer:
This is a district decision.

(9). Question:
If a student uses the SAT CCR assessment option instead of the PARCC English 11 CCR assessment option, and PARCC English 11 assessment results are tied to teacher performance, how will that affect the teacher?

Answer:
This is a district decision.

(10). Question:
How can comparisons be made between systems if a few systems opt for the SAT, some for the Accuplacer, and some for PARCC?

Answer:
As each district has unique challenges, any comparisons between districts should be done by the districts themselves solely for the purposes of informing best practices. Many students and their parents believe that earning a high school diploma is all that is needed to be ready for college level coursework or the demands of many careers. The spirit of the requirements of the law related to CCR assessments is that students and their parents will be provided with an
accurate assessment of how close students are to meeting the expectations they will face when they leave high school. If students’ CCR assessment scores reveal that they are not yet ready to meet post high school demands, students and their parents should be able to rest assured that the school system has a plan to provide senior year coursework that will help students become better prepared to meet the demands they will face once they leave high school. For this reason, it is hoped that districts will use the analysis of data from the CCR assessments and transition courses to improve practices designed to help students achieve a CCR designation by the time they graduate from high school.

(11). Question: Does allowing some districts to cover the cost for all of their students to take the SAT for CCR designation widen the equity gap?
Answer: All districts have the option to cover the cost for all of their students to take the SAT. It is each district’s decision whether to use the SAT as a CCR assessment for all students.

(12). Question: If a system uses the SAT and a student is absent on the day of testing, what is used in its place?
Answer: This is a district decision. Any of the other CCR assessment options could potentially be used.

(13). Question: In an IB program, what is the HL and SL designation?
Answer: HL is Honors Level and SL is Standard Level. While one is called “standard,” the test is a rigorous assessment of language skills and part of the IB program.

(14). Question: The Accuplacer score as indicated on the MSDE English Language Arts (ELA) Credit, Enrollment and Assessment Requirements chart lists the following scores: Score of 79+ Reading, 6+ Writing, and 90+ Sentence Skills. Can those scores be combined and averaged?
Answer: No, the listed scores are minimum scores for each assessment. These scores cannot be combined or averaged.

(15). Question: PARCC 10 and 11, ACT, AP, and IB all require essays; the SAT is optional. Do you want to make the SAT essay required to determine CCR status? Writing is a pivotal skill which perhaps should be scored. There will be a great discrepancy among systems when some use assessments where the essays are required.
Answer: The assessments and cut scores listed are accepted “as is.” It is up to the district to determine whether the test they choose to administer has an essay.

(16). Question: For the ACT, do students need to have a 21 or higher on the English and Writing subtests; the English and Reading subtests; or the English, Reading, and Writing
subtests? Is the writing piece optional?

**Answer:**
The student must achieve an average score of 21 or higher.

(17). **Question:**
Since there are additional instructional opportunities outside the regular English class, are there additional situations in which a student would be exempt from taking an ELA Transition Course? Unlike math where conceivably the student could not fit additional coursework in their schedule, in English, if the additional instructional opportunities are outside the regular school day, how would there be justification for a waiver?

**Answer:**
Transition courses or other instructional opportunities should take place during the regular school day and may not preclude or replace enrollment in a course otherwise required for graduation from high school. Students not designated college and career ready by the end of the 11th grade must participate in one of the following:
- Next ELA course in the sequence with support by adding additional time and additional content addressed, or
- ELA transition course, or
- Transition course articulated with a college, or
- Other ELA instructional opportunity, such as:
  - ELA module
  - Online ELA course
  - Hybrid ELA course

(18). **Question:**
For a school that offers the IB Program, knowing that the students have to score a 4 or higher on the IB exam, which exam determines CCR since there are multiple exams given through IB?

**Answer:**
Language A: Literature SL or HL
Language A: Language & Literature SL or HL
Language B is a second language proficiency assessment; therefore, it is not listed for CCR determination.
Students must achieve a score of 4 or above on one of the English-related IB exams.

(19). **Question:**
Can we have the students enroll in regular English during the first semester and enroll in an English course offered by the community college for the second semester? Will this cover the transition course because it would be outside the regular English classroom?

**Answer:**
Yes, if the English course is on a semester schedule, and the students are receiving the entire English 12 course in the first semester.

(20). **Question:**
Is it now true that a student will be considered college and career ready for ELA if s/he scores a 4 or above on the PARCC test for Grade 10 OR Grade 11?

**Answer:**
The English Grade 10 course is an option pending further research. Simply participating in the PARCC 10 or 11 does not constitute CCR designation.
Frequently Asked Questions

Mathematics Credit, Enrollment and Assessment Requirements

Please refer questions to:

Ms. Debra L. Ward
Coordinator of Mathematics
Maryland State Department of Education
Division of Curriculum, Assessment and Accountability
Telephone: 410.767.0355
Email: debra.ward@maryland.gov
Questions Related to:  
Maryland Education Article, Annotated Code of Maryland  
§ 7-205.1. High school curriculum and graduation requirements  
(b) Assessment of students; transition and other courses  
Section (2) (ii) states:  
“The implementation of transition courses or other instructional opportunities required under subparagraph  
(i) of this paragraph:  
3. Shall include an assessment or reassessment of the student after completion of the course; and  
4. May not preclude or replace enrollment in a course otherwise required for graduation from high  
school.”  

(1). Question:  
Does a senior, deemed not college and career ready in mathematics via a CCR assessment  
administered at the end of the 11th grade, need to enroll in a mathematics transition course during  
the senior year if enrollment in the transition course would preclude the student from taking a  
course required for graduation?  
Answer:  
No, if there is no room for additional courses in a student’s school schedule, then the student is not required  
to enroll in a mathematics transition course in the 12th grade.  

(2). Question:  
Does a senior, deemed not college and career ready in mathematics via a CCR assessment  
administered at the end of the 11th grade, need to be provided other instructional opportunities  
beyond the school day in order to satisfy the requirements of the law, if the student cannot fit a  
transition course into his/her schedule?  
Answer:  
No, transition courses or other instructional opportunities should take place during the regular school day.  
The statute states that a transition course may not “replace” a course needed to graduate. Thus, if a  
student needs credits in English Language Arts or in mathematics to graduate, transition courses in those  
content areas cannot be used to fulfill the regular English Language Arts or mathematics credits needed to  
grade. The transition course or instructional opportunity must be in addition to the English or  
mathematics course needed for graduation, by adding time spent and content addressed.  
The statute states that a transition course may not "preclude" enrollment in a course needed to graduate.  
Thus, if a student needs specific courses to graduate, and s/he cannot fit those courses and a transition  
course into his schedule, s/he need not take the transition course. A transition course cannot get in the way  
of a student completing regular graduation credit requirements.
Question Related to:
COMAR Regulation 13A.03.02.09 Diplomas and Certificates
Section B. (3)(c)
B. Maryland High School Diploma. Except as provided in Regulation 12 of this chapter, and in section C of this regulation, to be awarded a Maryland high school diploma student shall:

(3) Satisfy one of the following:

(a) Achieve a passing score as established by the Department on the Maryland High School Assessments for algebra, biology, English, and government;

(b) Achieve a combined score(s) as established by the Department on the Maryland High School Assessments;

(c) Achieve a score as established by the department on department-approved substitute assessment for algebra, biology, English, and Government, aligned with the Maryland High School Assessments such as Advanced Placement examinations, SAT I, SAT II, ACT, and International Baccalaureate examinations;

Additional Mathematics Requirements put into law by the College and Career Readiness and College Completion Act of 2013 (CCR)

General CCR Questions:

(3). Question:
All Maryland community colleges allow students who earn a score of 45+ on the College-Level Mathematics Accuplacer or a score of 500 or higher on the mathematics portion of the SAT to take designated college-level credit bearing mathematics courses. If a community college allows a high school student to take a college-level credit-bearing mathematics course, is the student considered to be college and career ready?

Answer:
Yes, if a community college allows a student to take a college-level credit-bearing mathematics course; however, taking and successfully completing a non-credit developmental mathematics course at a community college does not necessarily mean a student is college and career ready. Community colleges have several levels of developmental mathematics courses. A student would need to complete successfully the highest level non-credit developmental course to be designated as CCR.

(4). Question:
Dual enrollment is listed as an option for Grade 11 Assessment, but is it dual enrollment for students completing a course in Grade 11 or 12?
If the course is in lieu of another assessment, could an 11th grader take the credit bearing course in the summer before Junior or Senior year and have the class count?

Answer:
- Students in grade 11 dual enrolled in a college-level credit-bearing mathematics course do not need to take a CCR assessment.
- Students who are permitted by a local community college to take a college-level credit-bearing mathematics course during the summer between their 11th and 12th grade year are considered to be CCR and would not be required to take a 12th grade mathematics transition course or reassessment.
- Students in 12th grade dual enrolled in a college-level credit-bearing mathematics course are CCR
(5). Question: Who will oversee the testing and the collection of data? If the plan includes the next course in the sequence with support (as indicated on the MSDE English Language Arts (ELA) and Mathematics Credit, Enrollment and Assessment Requirements charts), how will this information be gathered and analyzed? 
   Answer: Beginning in the 2017 school year, MSDE will collect information on transition and module courses, and reassessments through the Maryland Course Catalog (MCC), Student-Course-Grade-Teacher (SCGT), High School Status and Completers (HSSC) data collections. The MCC data collection will gather the transition courses and modules offered by subject area in each LEA. The SCGT data collection will collect information on individual students taking and passing transition courses or modules. The HSSC data collection will collect information on students as they exit Maryland public high schools including their College and Career Readiness designation, any transition courses or modules, and reassessments.

(6). Question: CCR 12th grade reassessment options include the SAT and Advanced Placement mathematics exams. Results from Advanced Placement Exams typically become available after schools have dismissed for the summer. Depending on when a 12th grade student takes the SAT, the results may also not be available until after schools dismiss for the summer. How will a student learn of the CCR designation if the CCR assessment results are not available until the summer? 
   Answer: This is a district decision.

(7). Question: If a student uses the SAT CCR assessment option instead of the PARCC Algebra II CCR assessment option, and PARCC Algebra II assessment results are tied to teacher performance, how will that affect the teacher? 
   Answer: This is a district decision.

(8). Question: How can comparisons be made between systems if a few systems opt for the SAT, some for the Accuplacer, and some for PARCC? 
   Answer: As each district has unique challenges, any comparisons between districts should be done by the districts themselves solely for the purposes of informing best practices. Many students and their parents believe that earning a high school diploma is all that is needed to be ready for college level coursework or the demands of many careers. The spirit of the requirements of the CCR-CCA of 2013 related to CCR assessments is that students and their parents will be provided with an accurate assessment of how close students are to meeting the expectations they will face when they leave high school. If students’ CCR assessment scores reveal that the student is not yet ready to meet post high school demands, students and their parents should be able to rest assured that the school system has a plan to provide senior year coursework that will help students become better prepared to meet the demands they will face once they leave high school. For this reason, it is hoped that districts will use analysis of data from the CCR assessments and transition courses to improve practices designed to help students achieve a CCR designation by the time they graduate from high school.
(9). Question:
Does allowing some districts to cover the cost for all of their students to take the SAT for CCR designation widen the equity gap?
Answer:
Districts have the option to cover the cost for all of their students to take the SAT. It is each district’s decision whether to use the SAT as a CCR assessment for all students.

(10). Question:
If a system uses the SAT and a student is absent on the day of testing, what is used in its place?
Answer:
This is a district decision. Any of the other CCR assessment options could potentially be used.

(11). Question:
There is a great deal of confusion over whether or not PARCC Geometry can be used as a college and career ready test for grade 11. If it can, will it count for CCR if the student scores a 4 or 5?
Answer:
Section 7-205.1b.1 of the Annotated Code of Maryland (https://www.lexisnexis.com/hottopics/mdcode/) stipulates that beginning with the 2015-2016 school year, all students shall be assessed using acceptable college placement cut scores no later than the 11th grade to determine whether the student is ready for college-level credit bearing course work. To be ready for credit-bearing college-level coursework in Mathematics, students must possess the foundational skills acquired through successful completion of Algebra II. It is unlikely that a student who has not yet competed Algebra II would be ready for credit bearing college-level mathematics coursework. Pending further research, LEAs may use the PARCC Geometry assessment as a CCR assessment for 11th grade students enrolled in Geometry in the 2016-2017 school year in order to comply with the requirement that all students be assessed by the end of the 11th grade to determine readiness for college-level credit bearing coursework in mathematics.

(12). Question:
Would earning a score of 4 or 5 on either the Geometry PARCC or the PARCC Algebra II assessment result in a student being designated as CCR?
Answer:
If a student earns a score of 4 or 5 on the PARCC Algebra II assessment, the student will receive a CCR designation. If a student earns a score of 4 or 5 on the PARCC Geometry assessment, the student is considered on track for being CCR after taking Algebra II.

(13). Question:
If a student fails to earn a Geometry credit by the end of the 11th grade and needs to re-take Geometry as a senior, can the PARCC Geometry assessment fulfill the CCR reassessment requirement?
Answer:
Yes, if a student fails to pass Geometry by the end of junior year and is re-taking Geometry as a senior to earn the Geometry credit required for graduation, the PARCC Geometry assessment could be used to fulfill the CCR reassessment requirement.

(14). Question:
Are we required to have our current 11th grade students enroll in a transition class during 2016-2017 (Grade 12) if they do not achieve CCR via the PARCC Algebra II or some other identified assessment score?
Answer:
Yes, despite the fact the students who graduate during the 2016-2017 are not required to enroll in a
mathematics course every year, Section 7-205.b.2 of the Annotated Code of Maryland stipulates that transition courses must be in place next year.

“(i) Subject to subparagraph (ii) of this paragraph, the Department, in collaboration with local school systems and public community colleges, shall develop and implement, by the 2016-2017 school year, transition courses or other instructional opportunities to be delivered in the 12th grade to students who have not achieved college and career readiness by the end of the 11th grade.” Students are not required to enroll in a transition course if it precludes them from enrolling in a course required for graduation.

(15). Question:
COMAR 13A.03.02.09.C.(2) indicates that any student who has taken a PARCC-aligned Algebra I course prior to the 2016-2017 school year may meet the graduation requirements for Algebra I by passing Algebra I and taking the assessment aligned with the Algebra I course at least one time. Does this regulation mean that students only have to take one of the CCR assessments but will not be required to earn the designated cut score since the students only have to take the PARCC Algebra I assessment?

Answer:
There is no connection between the graduation requirements associated with Algebra I and the CCR assessment requirements.

Section 7-205.b.2 of the Annotated Code of Maryland stipulates that transition courses must be in place next year.

“(i) Subject to subparagraph (ii) of this paragraph, the Department, in collaboration with local school systems and public community colleges, shall develop and implement, by the 2016-2017 school year, transition courses or other instructional opportunities to be delivered in the 12th grade to students who have not achieved college and career readiness by the end of the 11th grade.” COMAR 13A.03.02.09C.(2) is in reference to earning a diploma; it is unrelated to meeting the CCR requirement. PARCC Algebra I does not satisfy the requirement for CCR designation; however, PARCC Algebra I does satisfy a graduation requirement.

(16). Question:
Can a single mathematics course taken during the senior year satisfy both an LEA requirement that a student earn a 4th mathematics credit and mathematics transition course requirement if the same student was deemed not CCR at the end of the 11th grade?

Answer:
In this situation, one senior year mathematics course can satisfy both local and state requirements. MSDE is working on how LEAs should code this scenario.

(17). Question:
IB Exams are typically given during the 12th grade. Why are IB exams listed under CCR assessment options?

Answer:
IB exams were listed to cover unusual circumstances. If a student took an IB exam as an 11th grader due to some unusual circumstance, the score earned could determine CCR.