

**THE UNIVERSITY OF HONG KONG
SCHOOL OF COMPUTING AND DATA SCIENCE**

Bachelor of Engineering in Computer Science [BEng(CompSc)]: Programme Learning Outcomes

(Applicable to students admitted in the academic year 2025-26 and thereafter)

Programme Learning Outcomes

Upon successful completion of the curriculum, students should be able to:

- (a) apply knowledge of computing and mathematics appropriate to the programme outcomes and to the discipline
- (b) apply knowledge of a computing specialization, and domain knowledge appropriate for the computing specialization to the abstraction and conceptualization of computing models
- (c) analyze a problem, and identify and define the computing requirements appropriate to its solution
- (d) design, implement, and evaluate a computer-based system, process, component, or programme to meet desired needs with appropriate consideration for public health and safety, social and environmental considerations
- (e) function effectively on teams to accomplish a common goal
- (f) demonstrate an understanding of professional, ethical, legal, security and social issues and responsibilities
- (g) communicate effectively with a range of audiences
- (h) analyze the local and global impact of computing on individuals, organizations, and society
- (i) recognize the need for and an ability to engage in continuing professional development
- (j) use current techniques, skills, and tools necessary for computing practice with an understanding of the limitations

Programme Learning Outcomes (PLOs) mapped against University Education Aims (UEAs)

Curriculum Level Outcomes	University Educational Aims
Upon successful completion of the curriculum, students should be able to: (a) apply knowledge of computing and mathematics appropriate to the programme outcomes and to the discipline (b) apply knowledge of a computing specialization, and domain knowledge appropriate for the computing specialization to the abstraction and conceptualization of computing models (c) analyze a problem, and identify and define the computing requirements appropriate to its solution (d) design, implement, and evaluate a computer-based system, process, component, or programme to meet desired needs with appropriate consideration for public health and safety, social and environmental considerations (i) recognize the need for and an ability to engage in continuing professional development (j) use current techniques, skills, and tools necessary for computing practice with an understanding of the limitations	University Educational Aim 1. <ul style="list-style-type: none">• To enable our students to develop their capabilities in pursuit of academic/professional excellence, critical intellectual inquiry and life-long learning

<p>Upon successful completion of the curriculum, students should be able to:</p> <p>(c) analyze a problem, and identify and define the computing requirements appropriate to its solution</p> <p>(j) use current techniques, skills, and tools necessary for computing practice with an understanding of the limitations</p>	<p>University Educational Aim 2.</p> <ul style="list-style-type: none"> • To enable our students to develop their capabilities in tackling novel situations and ill-defined problems
<p>Upon successful completion of the curriculum, students should be able to:</p> <p>(f) demonstrate an understanding of professional, ethical, legal, security and social issues and responsibilities</p> <p>(h) analyze the local and global impact of computing on individuals, organizations, and society</p>	<p>University Educational Aim 3.</p> <ul style="list-style-type: none"> • To enable our students to develop their capabilities in critical self-reflection, greater understanding of others, and upholding personal and professional ethics
<p>Upon successful completion of the curriculum, students should be able to:</p> <p>(f) demonstrate an understanding of professional, ethical, legal, security and social issues and responsibilities</p> <p>(g) communicate effectively with a range of audiences</p> <p>(h) analyze the local and global impact of computing on individuals, organizations, and society</p>	<p>University Educational Aim 4.</p> <ul style="list-style-type: none"> • To enable our students to develop their capabilities in intercultural communication, and global citizenship
<p>Upon successful completion of the curriculum, students should be able to:</p> <p>(e) function effectively on teams to accomplish a common goal</p> <p>(g) communicate effectively with a range of audiences</p>	<p>University Educational Aim 5.</p> <ul style="list-style-type: none"> • To enable our students to develop their capabilities in communication and collaboration
<p>Upon successful completion of the curriculum, students should be able to:</p> <p>(d) design, implement, and evaluate a computer-based system, process, component, or programme to meet desired needs with appropriate consideration for public health and safety, social and environmental considerations</p> <p>(e) function effectively on teams to accomplish a common goal</p> <p>(h) analyze the local and global impact of computing on individuals, organizations, and society</p>	<p>University Educational Aim 6.</p> <ul style="list-style-type: none"> • To enable our students to develop their capabilities in leadership and advocacy for the improvement of the human condition