

School of Computing
Department of Information Technology

SECTION 1 - GENERAL COURSE INFORMATION

Course Title:	Online Organizational Strategy for Cybersecurity Management
Course Prefix and Number:	ITEC 8110-01
Course CRN#:	21663
Semester & Session:	Spring 2023 (First 8-Week Term)
Campus Location:	Fully Online
Meeting Days:	Asynchronous Learning via D2L/Brightspace
Meeting Time:	Asynchronous Learning via D2L/Brightspace

INSTRUCTOR'S INFORMATION

Name:	Dr. Debra J. Borkovich
E-mail Address:	debra.borkovich@mga.edu
Office Location:	Virtual
Office Phone Number:	412-418-3758
Tentative Office Hours:	By Appointment Only (Email to Schedule Call or Bb Collaborative Meeting)

COVID-19 STATEMENT

The University System of Georgia (USG) continues to recognize COVID-19 vaccines and boosters offer safe, effective protection and urges all students, faculty, staff and visitors to get vaccinated and/or boosted either on campus or with a local provider.

We encourage our MGA community to adopt a self-care and personal responsibility approach to wellness as positive actions to protect self and others; each of us doing our part to keep the MGA community healthy and campus academics and activities thriving. We ask you to complete the **elf report form** if you have tested positive to COVID-19 and review the **Quarantine and Isolation Calculator** to determine the appropriate actions to take. Visit updated information at this website: https://www.mga.edu/coronavirus/.

Carefully review your Syllabus, D2L/Brightspace Announcements, and MGA emails for details.

SECTION 2 - DETAILED COURSE INFORMATION

Course Prerequisite: Admission to DSc in IT program

Credit Hours: 3.0

Course Description: This course takes an operational approach to implementing and managing

cybersecurity strategic plans within organizations. The goal of this course is to understand leading cybersecurity from a non-technical focus. It is designed to have students think about security on the highest strategic

level directly and specifically related to their organization. If students are not working within an organization that can be used for course activities, they will need to identify one and research information about the way this organization addresses cybersecurity strategy and decision-making.

Course Philosophy:

This course advances an operational and leadership approach to understand cybersecurity risks and how to build a cybersecurity strategy and framework to gather threat intelligence and mitigate the risks.

Student learning outcomes:

Upon completion of this course the students will be able to:

- Evaluate the current security state and posture of the organization.
- Prioritize the value of technology assets.
- Interpret organizational cybersecurity pathways to improve risk management approach.
- Outline how the organization manages information, handles threats, and integrates cybersecurity into business operations.

Topics:

- Cybersecurity Framework
- Cybersecurity
- Corporate technical strategy
- Cyber resilience
- Design Approach
- Functional technology planning
- Operational technology planning
- Resource and technical capabilities
- Technical asset management

Required course materials:

A Leader's Guide to Cybersecurity: Why Boards Need to Lead--and How to Do It.

Authors: Thomas J. Parenty & Jack J. Domet (2020)

Publisher: Harvard Business Review Press

ISBN: 978-1633697997 (Hardback) ISBN: 978-1633698000 (eBook)

Technology Requirement:

The following will be used in this course:

- Students are required to have access to a computer and the Internet. All
 assignments, the course schedule, announcements, course syllabus, course
 content, rubrics, and supplemental course materials are posted on the D2L
 Course Shell.
- We may use a computer webcam with a built-in microphone to participate in possible virtual meetings with the instructor.
- Microsoft Office (Word, Excel, & PowerPoint)

Library/Learning Resources:

As a Middle Georgia State University student, you have complete access to GALILEO (Georgia Library Learning Online), a virtual library of licensed commercial databases. It provides access to over 100 databases indexing thousands of periodicals and scholarly journals. There are over 10,000 journal titles available in full-text. Additional GALILEO resources include e-books, government documents, reference collections, and video databases. The Middle Georgia State University library also has core collection with locally purchased resources to support this graduate course. Currently the exclusive holdings for the B.S. / M.S. in Information Technology graduate courses are as follows: e-Journals = 1,661, Print Books = 1,164, e-books = 4,325, and DVDs = 66.

The following are examples of online databases that support this undergraduate course. They are available to you through GALILEO and/or institutionally funded subscriptions:

- ACM Digital Library
- Computer Source
- Computing (ProQuest)
- Academic Search Complete
- Research Library (ProQuest)
- Wilson Omnifile: Full-Text Mega Edition
- Google Scholar
- Films on Demand

Student Support Services: Tutoring is available free of charge on all MGA campuses for currently enrolled students. To view the contact info, subjects tutored, and tutor availability, go to the SSC website at http://www.mga.edu/student-success-center/. SSC tutoring sessions may be scheduled online and face-to-face through the "Book an Appointment" link on the Student Success Center website. Other services include online academic workshops and a robust website with resources for academic assistance. The SSC also has computer workstations, printing, and Internet access.

SECTION 3 - COURSE ASSESSMENT INFORMATION

Final grades are computed based on the successful completion of the following assignments listed below. The grading of the course breaks down as follows:

Assignment	Description		Weight/%	Points	Total
D1-D6. Discussions	Each of the 6 Discussion Posts is an individual	6	23%	20	120
	assignment. Students are expected to read and				
	comment on a minimum of 2 other posts, as well.				
A1-A3. Assignments	Each of the 3 Written Papers is an individual	3	58%	100	300
	assignment.				
A4. Final Project -	Final Assignment is an individual Reflection Paper	1	19%	100	100
Reflection	incorporating the entire scope of the course.				
			100%	Total =	520

NOTE: A Final Grade of B or higher is required to successfully complete this graduate course. *Assignments will be graded as follows:*

Grade	Description
Excellent (A)	The quality of work meets the doctoral requirements in both originality and mastery of the material. This is equivalent to an A grade.
Satisfactory (B)	The work meets the minimum requirements. The work is short of excellence, originality, and does not fully demonstrate mastery of the material. This is equivalent to a B grade.
*NC	TE: Anything below a Satisfactory (B level) is deemed to be a failing grade.
Unsatisfactory (F)	The work is deficient as the minimum requirements have not been. This is equivalent to an F grade*.

Final course grades will be recorded as follows:

Letter Grade	Percent
A	90% - 100%

В	80% - 89%
С	70% - 79%
D	60% - 69%
F	00% - 59%

Overview of Course Assignments

Discussions. Students will make an original post (with references) based on the prompt and are required to review and comment on at least two other submissions.

Assignments. Three assignments are short research papers typed in APA (2020, 7th ed.) style and formatting, including a title page, references, and in-text citations. Papers must be developed (and uploaded) in an MS word.doc, double-spaced, in Times New Roman font, 12-point size.

Final Paper - Reflection. The fourth assignment is also a short Reflection paper typed in APA (2020, 7th ed.) style and formatting, including a title page, references, and in-text citations. Papers must be developed (and uploaded) in an MS word.doc, double-spaced, in Times New Roman font, 12-point size.

NOTE: Schedule of Assignments & Due Dates are located in Section 5 of this Syllabus.

CRITERIA FOR DETERMINING THE FINAL COURSE GRADE

The following point scale will be used to calculate the final course grade. **As depicted below, Final & Midterm Grades will be calculated as a percentage of total points achieved.**

Grade	Percentage(s)	Midterm Grade Points Achieved	Final Grade Points Achieved		
Α	90% - 100%	234 - 260	468 - 520		
В	80% - 89%	208 - 233	416 - 467		
NOTE: A grade of	NOTE: A grade of B or higher is required to successfully complete this course. Less than 416 Total Final Grade Points				
is unsatisfactory and requires a re-take of the course to complete a Master's Degree.					
С	70% - 79%	182 - 207	364 - 415		
D	60% - 69%	156 - 181	312 - 363		
F	Less than 60%	0 - 155	0 - 311		

SECTION 4 - INSTRUCTOR-SPECIFIC POLICIES

ONLINE COURSE EXPECTATIONS

1. Graduate Learning.

Graduate online learning assumes a high level of maturity and professionalism. It is designed to make learning more convenient but no less rigorous. The lack of a formal meeting schedule in an online course can be liberating. It can also be demanding because you must determine when to make time for class. Self-discipline and good time management skills are necessary when taking an online course.

2. Time Commitment.

Please remember that you will spend as much or more time completing an online course as you would taking it in a traditional face-to-face/classroom format. The special circumstances of taking an online course demand regular and consistent participation. Be sure to pace yourself throughout the semester making sure your responses to communications and assignments are timely. If you are not able to participate in any assigned class activities, you must contact your instructor immediately.

- **3. Email.** Official institutional email (MGA or D2L) is used only for communication between the instructor and students. The instructor will endeavor to reply to your email queries within 12 hours and no more than 24 hours of their receipt, excluding weekends and holidays or during semester breaks. Private email accounts <u>must not</u> be used to communicate between the instructor and students. Students must notify the Instructor (via email), asap and before the due date/time the assignment is due, if an authorized extension is needed for a specific due date. *Make sure the course and section and topic are clearly noted in the subject line of the email* (Example: YourLastName_ITEC.8110-01_Mod1.Assignment1).
- **4. All Submissions/Uploads.** When saving your files to submit (upload) you must include your name and course information. **Example: YourLastName_ITEC.8110-01_Mod1.A1**
- **5.** Check the D2L/Brightspace Course Shell for Announcements, Emails, Discussions, and/or Assignments Updates at least three or more times per week.
- **6. Late Assignments. Late submissions will not be accepted** and will be assigned a grade of F, unless pre-arranged with the Instructor for an authorized due date extension. **NO DUE DATE EXTENSIONS WILL BE AUTHORIZED FOR THE FINAL PROJECT A4. ASSIGNMENT.**
- **7. APA References and Citations.** Students are expected to submit original work for all discussions, assignments, and research papers. All submitted work must include references from a valid source (book, journal article, scholarly research, notable website). **References must be in APA style and formatting. The Publication Manual of the American Psychological Association (APA, 2020, 7th ed.), a comprehensive handbook on writing for publication, addresses editorial style, grammar, and organization is available online. This manual is not required but highly recommended.**
- **8.** Learning Modules: All learning module will be released at the start of the course and remain open until **11:59 pm** the day they are due. Each learning module contains documents that review the material assigned for the week. Students should review the contents of the module before attempting to complete any of the weekly assignments.
- **9. Peer Review.** Participation in peer evaluation of others' work offers the opportunity for high fidelity learning. Peer evaluation is the evaluation of your colleague's work by one or more classmates. It functions as a form of feedback to enhance and improve one's work. Your feedback must be professional, respectful, useful, and constructive.

10. General Guidance.

This syllabus is provided for general guidance on course activities and expectations. The instructor reserves the right to modify the syllabus in response to changing student needs or pedagogical circumstances. Changes are announced and posted in the D2L/Brightspace course shell.

Check the class website for assignments or discussions at least three times or more per week.

SECTION 5 - TENTATIVE COURSE SCHEDULE AND OUTLINE

The schedule below contains class activities, assignments, and deadlines. Note that the course schedule is "tentative" and subject to change based on student and/or pedagogical needs. All changes will be announced and posted on the course website.

Modules	Readings	Activities	Due Date
	Part 1 of Leader's Guide to	Complete: Entry Quiz - Attendance	
	Cybersecurity	Verification (Due: WK1)	Jan 15
Mod1/Week 1:	Intro: Digital Stewardship		(11:59
(Jan 11 - Jan 15)	(pp. 1-9)	D1. Discussion 1: Justify the	PM)

Modules	Readings	Activities	Due Date	
	➤ The Problems (pp. 13-55)	Board's Actions (Due: WK1)	Short	
		Start A1. Assignment 1: Board	WK!	
		Presentation (Due: WK2)		
Martin Luther King Holiday - January 16, 2023 (Monday)				
Mod2/Week 2: (Jan 17 - Jan 22)	 Part 2 of Leader's Guide to Cybersecurity The Principles (pp. 59-75) Alexander, O., Belisle, M., & Steele, J. (2020). MITRE ATT&CK® for industrial control systems: Design and philosophy. 	D2. Discussion 2: Plan for ATT&CK (Due: WK2) A1. Assignment 1 - Board Presentation (Due: WK2) Start A2. Assignment 2: Paper	Jan 22 (11:59 PM)	
	ATT&CK_for_ICS Philosophy Paper (.pdf)	Application of Tactics (Due WK3)		
Mod3/Week 3: (Jan 23 - Jan 29)	 Part 3 of Leader's Guide to Cybersecurity The Responsibilities	D3. Discussion 3: Provide a Solution (Due: WK3) A2. Assignment 2: Paper Application of Tactics (Due WK3)	Jan 29 (11:59 PM)	
Mod4/Week 4: (Jan 30 - Feb 5)	 Part 4 of Leader's Guide to Cybersecurity ➤ The Aides (pp. 169-191) Moore, T., Dynes, S., & Chang, F. R. (2015). Identifying how firms manage cybersecurity investment. tylermoore.utulsa.edu/ciso 15ibm (.pdf) 	D4. Discussion 4: Cyber-attacks & recommended controls (Due: WK4)	Feb 5 (11:59 PM)	
	Midterm Grades Due to SWORDS: (Calculated at the End of WK3.		
February	y 10, 2023: Final Day to Submit Applica	ation for "W"ithdrawal from the Cours	e.	
Modules	Readings	Activities	Due Date	
Mod5/Week 5: (Feb 6 - Feb 12)	 Conclusion of Leader's Guide to Cybersecurity Conclusion (pp. 193-197) Greiman, V. (2018). Reflecting on cyber governance for a new world order: An ontological approach. Kidmore End: Academic Conferences International Limited. Retrieved from https://www.proquest.com/conference-papers-proceedings/reflecting-on-cyber- governance-new-world-order/docview/2088045394/se- 2?accountid=12418 	D5. Discussion 5: Pitfalls in cybersecurity and technology leadership and organizational strategy (Due: WK5) Start A3. Assignment 3: Leading in a Crisis Presentation (Due: WK6)	Feb 12 (11:59 PM)	

Mod6/Week 6: (Feb 13 - Feb 19)	 Behind the Scenes: Art of Cyberspace Management (Vaibhav, 2022) Chapt. 15, Remote Working & Threat Detection (pp. 70-74, .pdf) Chapt. 16, Post-Covid Roadmap (pp. 76-80, .pdf) 	A3. Assignment 3: Leading in a Crisis Presentation (Due WK6) Start A4. Final Paper Assignment 4 - Reflection (Due: WK8)	Feb 19 (11:59 PM)	
Mod7/Week 7: (Feb 20 - Feb 26)	 Readings: None Review all prior readings to prepare for the A4. Reflection Paper. 	D6. Discussion 6: Explore Globally (Due: WK7) Continue Development A4. Final Paper Assignment 4 - Reflection (Due: WK8)	Feb 26 (11:59 PM)	
Mod8/Week 8: (Feb 27 - Mar 1)	• Readings: None	A4. Final Paper Assignment 4 - Reflection (Due: WK8, 3/1/23) Late Work WILL NOT Be Accepted.	Mar 1 (11:59 PM) Short WK!	
March 3, 2023 - Final Grades are Due to SWORDS at End of WK8. March 19, 2023 - Final Grades Available to Students in SWORDS.				

SECTION 6 - COURSE EXPECTATIONS

ONLINE COURSE EXPECTATIONS

- 1. Students must immediately review the tentative course schedule (included as part of the syllabus) for the schedule of discussion activities, assignments, projects, and/or examinations.
- 2. Students are required to have access to a computer and the Internet.
- 3. All course materials (i.e. course syllabus, course content, the assignments and the schedule of activities, etc.) are posted in Brightspace D2L course/class web site.
- 4. Official institutional email (MGA or D2L) is used only for communication between the instructor and students. The instructor will endeavor to reply to your email queries within 12 hours and no more than 24 hours of their receipt, excluding weekends and holidays or during semester breaks. Private email accounts <u>must not</u> be used to communicate between the instructor and students.
- 5. Students must attend class if they are to be well prepared for the workplace. Online courses are no different from on- campus classroom courses in this regard. Therefore, online students are subject to the college's attendance policy. Please see the "Attendance Policy" in the college's catalog. For online classes, participation must be defined in a different manner. Student attendance in online courses is defined as active participation in the course as described in the course syllabus.
- 6. Online courses will, at a minimum, have weekly mechanisms for student participation, which can be documented

using any or all the following methods: a graded discussion activity that is integral to student engagement and learning; a graded assignment/project/examination. Your instructor will begin grading all assessments after the deadline and make the results available to you within one week after the due date for the assessment.

- 7. Online courses are not self-paced and regular participation in online courses is required and will be recorded by your instructor. Students are expected to complete all course assessments using D2L. Online learning assumes a high level of maturity and professionalism designed to make learning more convenient but no less rigorous. Self-discipline and good time management skills are necessary when taking an online course. Remember that you will spend as much or more time completing an online course as you would taking it in a traditional face-to-face/classroom format. The special circumstances of taking an online course demand regular and consistent participation. If you cannot participate in any assigned class activities, you must contact your instructor immediately.
- 8. "No-Show" Reporting. The instructor is required to report "no-shows" or students who do not show up on the first day of class. Therefore, all students enrolled in the course must verify their enrollment. This can affect financial aid and you may be dropped from the class. Your instructor will notify you as to how to verify your enrollment before the beginning of the term to ensure that you are not reported as a "no-show."

ONLINE DISCUSSIONS AND POSTINGS

Expectations for Achieving Responsible Online Discourse

One value we must share is respect for individuals - their experience and their ideas or social positions. We also share a genuine desire to learn from one another. In order to demonstrate these shared values, you are encouraged to consider how your tone, word choice, and content may affect other readers. *Some ways people achieve responsible public electronic discourse include:*

- a) calling each other by name on the screen,
- b) using smiley faces =) to clarify meaning if a writer's tone might be ambiguous,
- c) clarifying with someone courteously before "flaming" back a quick response, and
- d) refraining from publishing or forwarding any questionable jokes or strong language that could offend various readers.

Guidelines for Online Discussions

Not only respond to your instructor's questions but carry on a dialogue with your classmates as well. This is a discussion, not just a question-and-answer session, and establishes community. If you only respond to your instructor's question it makes the discussion more of an "exam" rather than a dialogue.

Do not get caught up in "winning" the debate. We are here to learn the material, have fun, and to discuss matters of importance with others. Read all postings from your classmates, not just those from the instructor. Sometimes future questions are based on the insights of your classmates.

When replying to another student, include a brief sentence or two summarizing what they said that you are agreeing with and then your views. You might also consider changing the subject line to reflect your posts. Identify the person you are addressing and make it easy for us to figure out who you are talking to and what you are talking about.

If you express an opinion, support it with material from our readings or other sources if applicable. When you quote, summarize, or paraphrase from the text, be sure to give the page number(s) -- This is important! **Count on checking the class website for assignments or discussions at least three times or more per week.**

ATTENDANCE POLICY

Faculty are expected to maintain an attendance record for all classes, regardless of delivery mode. These records are often requested by the Provost Office for student petitions and the Financial Aid Office for last day of attendance. The MGA policy on attendance is found in Section 5.04.05 of the Faculty Handbook and in the Academic Catalog (https://mga.smartcatalogiq.com/2020-2021/Undergraduate-Catalog/Academic-Policy-and-Information/Course-Policies/Attendance-Policy).

Fully Online Courses: For the purposes of mandatory attendance, the Instructor will record affirmative attendance for the students that submit the weekly D2L/Brightspace assignments on or before the required due dates/times. Students that do not submit any work for more than 14 consecutive days in an online course or partially online course may be assigned a failing grade for the course.

CLASS BEHAVIOR EXPECTATIONS AND CONSEQUENCES FOR VIOLATIONS

Middle Georgia State University students are responsible for reading, understanding, and abiding by the MGA Student Code of Conduct." Student Code of Conduct, Responsibilities, Procedures, and Rights are found at http://www.mga.edu/student-affairs/docs/MGA Student Handbook.pdf#page=45.

STUDENT WITHDRAWAL POLICY

Students are encouraged to read the withdrawal policy found at https://www.mga.edu/registrar/registration/drop-add.php before dropping/withdrawing from the class.

Students who wish to withdraw from the University must complete the Withdrawal Form, obtaining the required signature from the advisor, and submitting it to the Office of the Registrar at the Macon campus or the administrative offices at other campuses. Withdrawal is not complete until all withdrawal procedures have been properly executed. https://www.mga.edu/registrar/

Students may withdraw from the course and earn a grade of "W" up to and including the midterm date, which occurs on *February 10, 2023*. After this date students who withdraw will receive a grade of "WF." https://www.mga.edu/academics/calendars/index.php

POLICY ON ACADEMIC MISCONDUCT

As a Middle Georgia State student and as a student in this class, you are responsible for reading, understanding, and abiding by Middle Georgia State's Student Code of Conduct.

Quoted directly from the Student Handbook, I believe it is important that you recognize and understand the following about plagiarism and cheating:

1. Individuals will fulfill their academic responsibilities in an honest and forthright manner.

Examples of prohibited behavior include but are not limited to: plagiarizing another's work (such as using another's phrasing, concepts or line of reasoning as your own without giving proper credit to the author or creator); submitting course assignments that are not your own; submitting the same paper in different classes without prior approval from both instructors; cheating (the use of any unauthorized means to gain academic advantage on assignments, laboratory reports or examinations); acquiring or using test materials without faculty knowledge; accessing any information, resource, and/or means of communication during an exam or assignment without specific authorization from the professor; failing to follow class policy; obtaining academic benefits through computer fraud or unauthorized access; engaging in academic fraud alone or with others; using material downloaded off Internet without proper citation; illicitly attempting to influence grading; failing to abide by test-taking procedures. The MGA Withdrawal Form is available online or in the Office of the Registrar. The entire Student Code of Conduct is included in Middle Georgia State's Student Handbook and is available online at https://www.mga.edu/student-conduct/

The penalty for academic misconduct is a grade of <u>zero</u> for the work involved and will be referred to the Dean of Students. Subsequent academic misconduct results in a failing grade for the course.

PLAGIARISM POLICY

A plagiarism prevention service is used in evaluation of written work submitted for this course. As directed by the instructor, students are expected to submit or have their assignments submitted through the service in order to meet requirements for this course. The papers will be retained by the service for the sole purpose of checking for plagiarized content in future student submissions.

POLICY ON DISABILITY/ACCESSIBILITY ACCOMMODATIONS

Students seeking ADA accommodations must contact Middle Georgia State University Office of Accessibility Services in Macon at (478) 471-2985 or in Cochran at (478) 934-3023. Students may also visit the Disability Services Office in room 266 of the Student Life Center on the Macon campus or in Georgia Hall Lower Level on the Cochran campus. https://www.mga.edu/accessibility-services/index.php

DELAYED OPENING OR CLOSING OF THE UNIVERSITY - NOT APPLICABLE TO FULLY ONLINE COURSES.

If class is unable to occur for an opening or closing of the university, go to the online webpage of the course for additional instructions. If there are no additional instructions provided on the course homepage news section, then just plan to meet at the normal next regularly scheduled meeting for the course.

HB 280 CAMPUS CARRY LEGISLATION

https://www.mga.edu/police/campus-carry.php

END OF COURSE EVALUATIONS

Student evaluations of faculty are administered online at the end of each term/session for all courses with five or more students. Students will receive an email containing a unique link to a survey for each course in which they are enrolled. All responses are anonymous, and completion of evaluations are voluntary.

STUDENT RESPONSIBILITIES

Students are responsible for reading, understanding, and adhering to all Middle Georgia State University student policies, including those linked on the **Syllabus Policy** page.

ACADEMIC MINDSET BELIEFS

The course activities/assignments in this course concerning the Academic Mindset shall contribute to your growth, self-efficacy, the relevancy of academic experience, and a sense of belonging. Throughout this course, growth mindset will be strengthened through activities/assignments by constant engagement. The following growth mindsets belief statements are the bedrock of this course and shall be acclaimed into mind by each student:

- I can strengthen my abilities through effort.
- The work in this course has value and purpose for me.
- I embrace new challenges.
- I will succeed if I put effort into my work.
- I will learn from success and failure to continue to improve.
- My effort and attitude are important to my future.