MASTER'S DEGREES IN SUPPLY CHAIN MANAGEMENT

Supply Chain Management Program (*https://catalog.mit.edu/interdisciplinary/graduate-programs/supply-chain-management*)

Master of Applied Science in Supply Chain Management (Residential Program)

The Master of Applied Science in Supply Chain Management degree is an intensive, 10-month residential program requiring 90 units of graduate subjects. Students complete at least 81 units of required and elective subjects and complete an 11-unit capstone project. The subject requirements for this program are described below.

Subject Requirements [1]

Fall Required Subjects		
SCM.250	Analytical Methods for Supply Chain Management I	3
SCM.259	Written Communication for Supply Chain Management	3
SCM.260[J]	Logistics Systems [2]	12
SCM.264	Databases and Data Analysis for Supply Chain Management [3]	6
SCM.275	Advanced Supply Chain Systems Planning and Network Design	6
SCM.800	Capstone Project in Supply Chain Management	5
IAP Required Subjects		
SCM.254	Analytical Methods for Supply Chain Management II	3
SCM.262	Leading Global Teams	3
Spring Required Subjects		
SCM.263	Advanced Writing Workshop for SCM	3
SCM.281	Supply Chain Public Speaking Workshop	1
SCM.800	Capstone Project in Supply Chain Management	6
SCM.256	Data Science and Machine Learning for Supply Chain Management	12
or SCM.C51 & 6.C51	Machine Learning Applications for Supply Chain Management and Modeling with Machine Learning: from Algorithms to Applications	
Required Electives [5]		
Supply Chain Track		6
Select subjects from two of the three following tracks: Analytics; Leadership and Management; and Strategy.		21-32
Total Units		**90-101**

1. *Students who have already successfully completed one of the required subjects at a graduate level elsewhere may petition to replace that subject with another elective.*
2. *With the approval of the instructor, students may substitute SCM.271 Logistics Systems Topics (3 units) plus 9 additional units of electives.*
3. *With the approval of the instructor, students may substitute SCM.274 Databases and Data Analysis Topics for Supply Chain Management (3 units) plus 3 additional units of electives.*
4. *With the permission of the program director, students may substitute SCM.253 Case Studies in Supply Chain Financial Analysis (6 units) plus 3 additional units of electives.*
5. *See SCM Track Electives* (p. 5).

Master of Engineering in Supply Chain Management (Residential Program)

The Master of Engineering in Supply Chain Management degree is an intensive, 10-month residential program requiring 90 units of graduate subjects. Students complete at least 78 units of required and elective subjects, and complete a 14-unit thesis. The subject requirements for this program are described below.

Subject Requirements [1]

Fall Required Subjects		
SCM.250	Analytical Methods for Supply Chain Management I	3
SCM.259	Written Communication for Supply Chain Management	3
SCM.260[J]	Logistics Systems [2]	12
SCM.264	Databases and Data Analysis for Supply Chain Management [3]	6
SCM.275	Advanced Supply Chain Systems Planning and Network Design	6
SCM.THG	Graduate Thesis	5
IAP Required Subjects		
SCM.254	Analytical Methods for Supply Chain Management II	3
SCM.262	Leading Global Teams	3
Spring Required Subjects		
SCM.263	Advanced Writing Workshop for SCM	3
SCM.281	Supply Chain Public Speaking Workshop	1
SCM.C51	Machine Learning Applications for Supply Chain Management	6
6.C51	Modeling with Machine Learning: from Algorithms to Applications	6
SCM.THG	Graduate Thesis	9
Required Electives [5]		
Supply Chain Track		6

Select subjects from two of these three tracks: Analytics; Leadership and Management; and Strategy.	18-38
Total Units	**90-110**

1 *Students who have already successfully completed one of the required subjects at a graduate level elsewhere may petition to replace that subject with another elective.*

2 *With the approval of the instructor, students may substitute SCM.271 Logistics Systems Topics (3 units) plus 9 additional units of electives.*

3 *With the approval of the instructor, students may substitute SCM.274 Databases and Data Analysis Topics for Supply Chain Management (3 units) plus 3 additional units of electives.*

4 *With the permission of the program director, students may substitute SCM.253 Case Studies in Supply Chain Financial Analysis (6 units) plus 3 additional units of electives.*

5 *See SCM Track Electives* (p. 5).

Master of Applied Science in Supply Chain Management (Blended Program)

The Master of Applied Science in Supply Chain Management degree is an intensive, five-month blended program requiring 90 units of graduate subjects. The MASc degree is only available to students who have successfully completed the MITx MicroMasters credential in Supply Chain Management. Students receive 42 units of advance standing credit for completion of the MicroMasters Credential, complete at least 39 units of required and elective subjects, and complete a 9-unit capstone project (a report, presentation, and executive summary of the project). The subject requirements for this program are described below.

Subject Requirements

Students receive advanced standing credit for completion of the MicroMasters Credential, which constitutes the first semester of the program.		
SCM.500	Studies in Supply Chain Management	42
Students complete the following subjects in residence, constituting the second semester of the program.		
IAP Required Subjects		
SCM.258	Written Communication Topics for Supply Chain Management	1
SCM.262	Leading Global Teams	3
SCM.254	Analytical Methods for Supply Chain Management II	3
Spring Required Subjects		
SCM.263	Advanced Writing Workshop for SCM	3
SCM.281	Supply Chain Public Speaking Workshop	1
SCM.256	Data Science and Machine Learning for Supply Chain Management	12
or SCM.C51 & 6.C51	Machine Learning Applications for Supply Chain Management and Modeling with Machine Learning: from Algorithms to Applications	
Required Electives [1]		
Supply Chain Track		6
Select subjects from two of the following three tracks: Analytics; Leadership and Management; and Strategy.		10-30
Capstone Requirement		
SCM.800	Capstone Project in Supply Chain Management	9
Total Units		**90-110**

1 *See SCM Track Electives* (p. 5).

Master of Engineering in Supply Chain Management (Blended Program)

The Master of Engineering in Supply Chain Management degree is an intensive, five-month blended program requiring 90 units of graduate subjects. The MEng degree is only available to students who have successfully completed the MITx MicroMasters credential in Supply Chain Management. Students receive 42 units of advance standing credit for completion of the MicroMasters Credential, complete at least 36 units of required and elective subjects, and complete a 12-unit thesis. The subject requirements for this program are described below.

Subject Requirements

Students receive advanced standing credit for completion of the MicroMasters Credential, which constitutes the first semester of the program.		
SCM.500	Studies in Supply Chain Management	42
Students complete the following subjects in residence, constituting the second semester of the program.		
IAP Required Subjects		
SCM.254	Analytical Methods for Supply Chain Management II	3
SCM.258	Written Communication Topics for Supply Chain Management	1
SCM.262	Leading Global Teams	3
Spring Required Subjects		
SCM.263	Advanced Writing Workshop for SCM	3
SCM.281	Supply Chain Public Speaking Workshop	1
SCM.C51	Machine Learning Applications for Supply Chain Management	6
6.C51	Modeling with Machine Learning: from Algorithms to Applications	6
Required Electives [1]		
Supply Chain Track		6
Select subjects from two of the following three tracks: Analytics; Leadership and Management; and Strategy.		7-27
Thesis Requirement		
A master's thesis, presentation, and executive summary of the thesis are required.		
SCM.THG	Graduate Thesis	12
Total Units		**90-110**

[1] *See SCM Track Electives* (p. 5).

Track Electives

Electives

The subjects listed below are recommended. Students may select other subjects with the approval of the advisor.

Strategy Track		
SCM.251	Supply Chain Financial Analysis	9
SCM.253	Case Studies in Supply Chain Financial Analysis	6
15.025	Game Theory for Strategic Advantage	9
15.011	Economic Analysis for Business Decisions	9
15.401	Managerial Finance	9
15.521	Accounting Information for Decision Makers	6
15.535	Business Analysis Using Financial Statements	9
15.900	Competitive Strategy	9
15.904	Strategy and the CEO	6
Supply Chain Track		
SCM.261[J]	Case Studies in Logistics and Supply Chain Management	6
SCM.270	Current Challenges in Supply Chain Management	2
SCM.283	Humanitarian Logistics	6
SCM.284	Humanitarian Logistics Project	6
SCM.289	E-Commerce and Omnichannel Fulfillment Strategies	6
SCM.290	Sustainable Supply Chain Management	6
SCM.291	Procurement Fundamentals	6
SCM.293[J]	Urban Last-Mile Logistics	6
SCM.294	Digital Supply Chain Transformation	6
SCM.295	Supply Chain Study Trek	1
SCM.301	Independent Study: Supply Chain Management	
SCM.302	Independent Study: Supply Chain Management	
15.762[J]	Supply Chain Analytics	12
15.763[J]	Supply Chain: Capacity Analytics	6
1.266	Supply Chain and Demand Analytics	6
15.769	Operations Strategy	9
Analytics Track		
1.200[J]	Transportation: Foundations and Methods	12
15.071	The Analytics Edge	12

15.774	The Analytics of Operations Management	12
15.871	Introduction to System Dynamics	6
15.872	System Dynamics II	6
15.873	System Dynamics for Business and Policy	9
15.C57[J]	Optimization Methods	12
IDS.145[J]	Data Mining: Finding the Models and Predictions that Create Value	6
IDS.147[J]	Statistical Machine Learning and Data Science	12
IDS.305[J]	Business and Operations Analytics	6
IDS.333[J]	System Design and Management for a Changing World: Tools	6
IDS.334[J]	System Design and Management for a Changing World: Projects	6
IDS.338[J]	Multidisciplinary Design Optimization	12
Leadership & Management Track		
SCM.287[J]	Global Aging & the Built Environment	12
15.286	Communicating with Data	6
15.386	Leading in Ambiguity: Steering Through Strategic Inflection Points	6
15.390	Entrepreneurship 101: Systematic Approach to New Venture Creation	12
15.768	Management of Services: Creating Value for Customers, Employees, and Investors	9
15.777	Healthcare Lab: Introduction to Healthcare Delivery in the United States	15
15.784	Operations Laboratory	9
15.915	Business Strategies for a Sustainable Future	9