Name: Zhang, Matthew Student ID: 20901534

Ontario Education Nbr: 618321210

### **Beginning of Undergraduate Record**

### Fall 2020

|  |  | Fall 2020  |   |  |                            |
|--|--|--|---|--|----------------------------|
| Program:<br>Level:   | Systems De<br>1A                               | esign Engineering, Honours, Co-operative Program Form Of Study: Enrolment  |   |  |                            |
| Course   |  | Description  | Attempted   | Earned   | <u>Grade</u>               |
| SYDE   | 101  | Communications in Systems Design Engineering-<br>Written and Oral  | 0.25  | 0.25   | 92                         |
| SYDE   | 101L   | Communications in Systems Design Engineering-<br>Visualization   | 0.25  | 0.25   | 92                         |
| SYDE<br>SYDE<br>SYDE<br>SYDE<br>SYDE                           | 111<br>113<br>121<br>161<br>181                | Fundamental Engineering Math 1 Matrices and Linear Systems Digital Computation Introduction to Design Physics 1 (Statics)  | 0.50<br>0.25<br>0.50<br>0.50<br>0.50<br>In GPA    | 0.50<br>0.25<br>0.50<br>0.50<br>0.50<br>Earned                           | 89<br>95<br>92<br>81<br>97 |
| Term GPA<br>Cumulativ<br>Academic                              | e GPA  | 90.64 Term Totals<br>90.64 Cumulative Totals<br>xcellent Standing Effective 01/21/2021   | 2.75<br>2.75                                      | 2.75<br>2.75   |                            |
| _  | 0 . 5  | Winter 2021  |   |  |                            |
| Program:<br>Level:   | 1A   | esign Engineering, Honours, Co-operative Program Form Of Study: Co-op Work Term  |   |  |                            |
| Course<br>COOP<br>PD   | 1<br>19  | Description Co-operative Work Term Tactics for Workplace Success  0.00 Term Totals   | Attempted<br>0.50<br>0.50<br>In GPA               | Earned<br>0.00<br>0.50<br>Earned   | <u>Grade</u><br>CR<br>CR   |
| Cumulativ  |  | 90.64 Cumulative Totals  | 1.00<br>2.75                                      | 0.50<br>3.25   |                            |
| Program:<br>Level:   | Systems De<br>1B                               | Spring 2021 esign Engineering, Honours, Co-operative Program Form Of Study: Enrolment  |   |  |                            |
| Course<br>ECON<br>SYDE<br>SYDE<br>SYDE<br>SYDE<br>SYDE<br>SYDE | 101<br>112<br>114<br>162<br>192<br>192L<br>223 | Description Introduction to Microeconomics Fundamental Engineering Math 2 Numerical and Applied Calculus Human Factors in Design Digital Systems Digital Systems Laboratory Data Structures and Algorithms | Attempted 0.50 0.50 0.25 0.50 0.50 0.50 0.50 0.50 | Earned<br>0.50<br>0.50<br>0.25<br>0.50<br>0.50<br>0.25<br>0.50<br>Earned | 95 82 93 84 90 90          |
| Term GPA   |  | 88.92 Term Totals  | 3.00  | 3.00   |                            |
| Cumulativ  |  | 89.74 Cumulative Totals xcellent Standing Effective 09/14/2021   | 5.75  | 6.25   |                            |
| Academic   | Standing.                                      | scellent Standing Effective 09/14/2021   |   |  |                            |
|  |  | Fall 2021  |   |  |                            |
| Program:<br>Level:   | Systems De<br>1B                               | esign Engineering, Honours, Co-operative Program Form Of Study: Co-op Work Term  |   |  |                            |
| Course<br>COOP<br>PD   | 2<br>20  | <u>Description</u> Co-operative Work Term Engineering Workplace Skills I: Developing Reasoned Conclusions  | Attempted<br>0.50<br>0.50<br>In GPA               | Earned<br>0.00<br>0.50<br>Earned   | <u>Grade</u><br>CR<br>CR   |
| Term GPA<br>Cumulativ  |  | 0.00 Term Totals<br>89.74 Cumulative Totals  | 1.00<br>5.75                                      | 0.50<br>6.75   |                            |

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Winter 2022

|  |   | Winter  | 2022  |  |   |
|--|---|---|---|--|---|
| Program:<br>Level:   |   | n Engineering, Honours, Co-operative Program<br>orm Of Study: Enrolment   | 1   |  |   |
| Course<br>SYDE<br>SYDE<br>SYDE<br>SYDE<br>SYDE<br>SYDE<br>SYDE | 182<br>211<br>261<br>263<br>283<br>285  | Description Physics 2 (Dynamics) Calculus 3 Design, Systems, and Society Engineering Prototyping Physics 3 (Electricity, Magnetism and Op Materials Chemistry   | Attempted 0.50 0.50 0.50 0.50 0.25 tics) 0.50 0.50 0.50 | Earned<br>0.50<br>0.50<br>0.50<br>0.25<br>0.50<br>0.50<br>Earned | Grade<br>87<br>73<br>85<br>CR<br>80<br>68 |
| Term GPA<br>Cumulative<br>Academic                             | e GPA                                   | 78.60 Term Totals<br>86.36 Cumulative Totals<br>I Standing Effective 05/19/2022   | 2.75<br>8.25  | 2.75<br>9.50   |   |
| Program:<br>Level:   |   | Spring<br>n Engineering, Honours, Co-operative Program<br>orm Of Study: Co-op Work Term   |   |  |   |
| COURSE<br>COOP<br>PD   | 3<br>4                                  | Description Co-operative Work Term Teamwork   | Attempted<br>0.50<br>0.50<br>In GPA                     | Earned<br>0.00<br>0.50<br>Earned                                 | <u>Grade</u><br>CR<br>CR                  |
| Term GPA<br>Cumulative   |   | 0.00 Term Totals<br>86.36 Cumulative Totals   | 1.00<br>8.25  | 0.50<br>10.00  |   |
| Program:<br>Level:   |   | Fall 2 n Engineering, Honours, Co-operative Program orm Of Study: Enrolment   | <del></del>   |  |   |
| Course<br>SYDE<br>SYDE<br>SYDE<br>SYDE<br>SYDE<br>SYDE<br>SYDE | 212<br>252<br>262<br>286<br>292<br>292L | Description Probability and Statistics Linear Systems and Signals Engineering Economics of Design Mechanics of Deformable Solids Circuits, Instrumentation, and Measureme Circuits, Instrumentation, and Measureme Laboratory |   | Earned<br>0.50<br>0.50<br>0.50<br>0.50<br>0.50<br>0.50           | Grade<br>77<br>84<br>88<br>92<br>87<br>77 |
| WKRPT  | 200                                     | Work-term Report  Degree Requirement, Not in Average  | 0.13<br>In GPA  | 0.13   | 89  |
| Term GPA<br>Cumulative<br>Academic                             | e GPA                                   | 84.82 Term Totals<br>85.98 Cumulative Totals<br>Ilent Standing Effective 01/19/2023   | 2.88<br>11.00   | <u>Earned</u><br>2.88<br>12.88                                   |   |
| Program:<br>Level:   |   | Winter n Engineering, Honours, Co-operative Program orm Of Study: Co-op Work Term   |   |  |   |
| Course<br>COOP<br>PD   | 4<br>5                                  | <u>Description</u> Co-operative Work Term Project Management  | Attempted<br>0.50<br>0.50<br><u>In GPA</u>              | <u>Earned</u><br>0.00<br>0.50<br><u>Earned</u>                   | Grade<br>CR<br>CR                         |
| Term GPA<br>Cumulative   |   | 0.00 Term Totals<br>85.98 Cumulative Totals   | 1.00<br>11.00   | 0.50<br>13.38  |   |

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| Program:<br>Level:                                      |   | Spring 2023<br>on Engineering, Honours, Co-operative Program<br>orm Of Study: Enrolment  |   |  |   |
|---|---|--|---|--|---|
| Course<br>SYDE<br>SYDE<br>SYDE                          | 311<br>351<br>361                       | <u>Description</u> Advanced Engineering Math 2 Systems Models 1 Systems Design Methods 1: Needs Analysis and Prototyping   | Attempted<br>0.50<br>0.50<br>0.50                         | Earned<br>0.50<br>0.50<br>0.50                                 | <u>Grade</u><br>94<br>61<br>84            |
| SYDE<br>SYDE<br>WKRPT                                   | 381<br>383<br>300                       | Thermodynamics Fluid Mechanics Work-term Report Degree Requirement, Not in Average   | 0.50<br>0.50<br>0.13<br>In GPA                            | 0.50<br>0.50<br>0.13<br>Earned                                 | 68<br>66<br>75                            |
| Term GPA<br>Cumulativ<br>Academic                       | e GPA                                   | 74.60 Term Totals<br>83.87 Cumulative Totals<br>d Standing Effective 09/14/2023  | 2.63<br>13.50   | 2.63<br>16.01  |   |
| Program:<br>Level:                                      |   | Fall 2023<br>gn Engineering, Honours, Co-operative Program<br>orm Of Study: Co-op Work Term  |   |  |   |
| Course<br>COOP<br>PD<br>Term GPA<br>Cumulativ           |   | Description Co-operative Work Term Ethical Decision Making  0.00 Term Totals 83.87 Cumulative Totals   | Attempted<br>0.50<br>0.50<br>In GPA<br>1.00<br>13.50      | Earned<br>0.00<br>0.50<br>Earned<br>0.50<br>16.51              | <u>Grade</u><br>CR<br>CR                  |
| Program:<br>Level:                                      |   | Winter 2024<br>on Engineering, Honours, Co-operative Program<br>orm Of Study: Enrolment  |   |  |   |
| Course<br>MSCI<br>MUSIC<br>SYDE<br>SYDE<br>SYDE<br>SYDE | 446<br>140<br>312<br>352<br>352L<br>362 | Description Introduction to Machine Learning Popular Music and Culture Applied Linear Algebra Introduction to Control Systems Control Systems Laboratory Systems Design Methods 2: Testing, Verification, and Validation | Attempted<br>0.50<br>0.50<br>0.50<br>0.50<br>0.25<br>0.50 | Earned<br>0.50<br>0.50<br>0.50<br>0.50<br>0.50<br>0.25<br>0.50 | Grade<br>80<br>77<br>76<br>78<br>84<br>74 |
| Term GPA<br>Cumulativ<br>Academic                       | e GPA                                   | 77.64 Term Totals<br>82.82 Cumulative Totals<br>d Standing Effective 05/16/2024  | <u>In GPA</u><br>2.75<br>16.25                            | <u>Earned</u><br>2.75<br>19.26                                 |   |
| Program:<br>Level:                                      |   | Spring 2024<br>In Engineering, Honours, Co-operative Program<br>orm Of Study: Co-op Work Term  |   |  |   |
| Course<br>COOP  | 6                                       | <u>Description</u> Co-operative Work Term  0.00 Term Totals  | Attempted<br>0.50<br>In GPA<br>0.50                       | Earned<br>0.00<br>Earned<br>0.00                               | <u>Grade</u><br>CR                        |
| Cumulativ   |   | 82.82 Cumulative Totals  | 16.25   | 19.26  |   |

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Fall 2024

| Pro | ogram: | Systems I | Design I | Enginee | ring, I | Honours, | Co-operative | Program |
|-----|--------|-----------|----------|---------|---------|----------|--------------|---------|
|     |        |           |          |         |         |          |              |         |

Level: 4A Form Of Study: Enrolment

| Course |     | <u>Description</u>                 | <u>Attempted</u> | Earned | <u>Grade</u> |
|--------|-----|------------------------------------|------------------|--------|--------------|
| CLAS   | 104 | Classical Mythology                | •                |        |              |
| SCI    | 206 | The Physics of How Things Work     |                  |        |              |
| SYDE   | 411 | Optimization and Numerical Methods |                  |        |              |
| SYDE   | 461 | Systems Design Capstone Project 1  |                  |        |              |
| SYDE   | 543 | Cognitive Ergonomics               |                  |        |              |
| WKRPT  | 400 | Work-term Report                   |                  |        |              |
|        |     | Degree Requirement, Not in Average |                  |        |              |

Milestones

| Date Completed | Description                                      | Status    |
|----------------|--|-----------|
| 11/30/2020     | Workplace Hazardous Materials Information System | Completed |
| 12/31/2020     | Undergraduate Communication Requirement          | Completed |
| 04/30/2021     | Work Term 1                                      | Completed |
| 12/31/2021     | Work Term 2                                      | Completed |
| 08/31/2022     | Work Term 3                                      | Completed |
| 12/31/2022     | Work Report 2                                    | Completed |
| 04/30/2023     | Work Term 4                                      | Completed |
| 08/31/2023     | Work Report 3                                    | Completed |
| 12/31/2023     | Work Term 5                                      | Completed |
| 08/31/2024     | Work Term 6                                      | Completed |
|                |  |           |

**Scholarships and Awards** 

2021 University of Waterloo President's Scholarship of Distinction

**End of Undergraduate Unofficial Transcript**