

[Technical Calculations] [การคำนวณทางเทคนิค]

Designing of Chain Drive Mechanism 3 (การออกแบบกลไกขับเคลื่อนโซ่สายพาน 3)

CHE40 (โซ่เดี่ยว) (kW)

| จำนวนฟันจวนโซ่เล็ก | ความเร็วรอบของจวนโซ่เล็ก (rpm) | | | | | | | | | | | | | | | | | | | | | | | | |
|--------------------|--------------------------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|
| | 10 | 25 | 50 | 100 | 200 | 300 | 400 | 500 | 700 | 900 | 1000 | 1200 | 1400 | 1600 | 1800 | 2100 | 2400 | 2700 | 3000 | 3500 | 4000 | 5000 | 6500 | 7000 | 8000 |
| 9 | 0.03 | 0.07 | 0.14 | 0.26 | 0.48 | 0.69 | 0.90 | 1.10 | 1.49 | 1.87 | 2.05 | 2.42 | 2.78 | 3.07 | 2.57 | 2.04 | 1.67 | 1.40 | 1.19 | 0.95 | 0.78 | 0.56 | 0.43 | 0.34 | 0.28 |
| 10 | 0.04 | 0.08 | 0.16 | 0.29 | 0.54 | 0.78 | 1.01 | 1.23 | 1.67 | 2.10 | 2.31 | 2.72 | 3.12 | 3.51 | 3.01 | 2.39 | 1.96 | 1.64 | 1.40 | 1.11 | 0.91 | 0.65 | 0.49 | 0.40 | 0.32 |
| 11 | 0.04 | 0.09 | 0.17 | 0.32 | 0.60 | 0.87 | 1.12 | 1.37 | 1.85 | 2.32 | 2.55 | 3.01 | 3.45 | 3.89 | 3.48 | 2.76 | 2.26 | 1.89 | 1.62 | 1.28 | 1.05 | 0.75 | 0.57 | 0.46 | 0.37 |
| 12 | 0.04 | 0.10 | 0.19 | 0.35 | 0.66 | 0.95 | 1.23 | 1.50 | 2.04 | 2.55 | 2.80 | 3.30 | 3.80 | 4.28 | 3.96 | 3.15 | 2.57 | 2.16 | 1.84 | 1.46 | 1.19 | 0.86 | 0.65 | 0.51 | 0.43 |
| 13 | 0.04 | 0.11 | 0.21 | 0.39 | 0.72 | 1.04 | 1.34 | 1.64 | 2.22 | 2.78 | 3.06 | 3.60 | 4.14 | 4.67 | 4.47 | 3.55 | 2.90 | 2.43 | 2.08 | 1.65 | 1.35 | 0.96 | 0.73 | 0.58 | 0.48 |
| 14 | 0.05 | 0.12 | 0.22 | 0.42 | 0.78 | 1.12 | 1.45 | 1.78 | 2.40 | 3.01 | 3.31 | 3.90 | 4.48 | 5.06 | 5.00 | 3.96 | 3.25 | 2.72 | 2.32 | 1.87 | 1.51 | 1.09 | 0.82 | 0.65 | 0.53 |
| 15 | 0.05 | 0.13 | 0.24 | 0.45 | 0.84 | 1.21 | 1.57 | 1.91 | 2.59 | 3.25 | 3.57 | 4.21 | 4.83 | 5.45 | 5.54 | 4.39 | 3.60 | 3.01 | 2.57 | 2.04 | 1.67 | 1.19 | 0.91 | 0.72 | 0.59 |
| 16 | 0.06 | 0.14 | 0.26 | 0.48 | 0.90 | 1.30 | 1.68 | 2.05 | 2.78 | 3.48 | 3.83 | 4.51 | 5.18 | 5.84 | 6.10 | 4.84 | 3.96 | 3.32 | 2.83 | 2.25 | 1.87 | 1.32 | 1.00 | 0.80 | 0.65 |
| 17 | 0.06 | 0.15 | 0.28 | 0.51 | 0.96 | 1.38 | 1.79 | 2.19 | 2.96 | 3.72 | 4.09 | 4.81 | 5.53 | 6.24 | 6.68 | 5.30 | 4.34 | 3.64 | 3.11 | 2.47 | 2.02 | 1.45 | 1.10 | 0.87 | 0.72 |
| 18 | 0.07 | 0.16 | 0.29 | 0.54 | 1.02 | 1.47 | 1.90 | 2.33 | 3.15 | 3.95 | 4.34 | 5.12 | 5.88 | 6.63 | 7.28 | 5.78 | 4.73 | 3.96 | 3.39 | 2.69 | 2.20 | 1.57 | 1.19 | 0.95 | 0 |
| 19 | 0.07 | 0.16 | 0.31 | 0.58 | 1.09 | 1.66 | 2.02 | 2.47 | 3.34 | 4.19 | 4.60 | 5.42 | 6.24 | 7.03 | 7.83 | 6.27 | 5.13 | 4.30 | 3.67 | 2.92 | 2.39 | 1.71 | 1.30 | 1.03 | 0 |
| 20 | 0.07 | 0.18 | 0.33 | 0.61 | 1.14 | 1.65 | 2.13 | 2.61 | 3.53 | 4.43 | 4.87 | 5.74 | 6.59 | 7.43 | 8.28 | 6.77 | 5.54 | 4.64 | 3.96 | 3.15 | 2.57 | 1.87 | 1.40 | 1.11 | 0 |
| 21 | 0.08 | 0.19 | 0.34 | 0.65 | 1.21 | 1.74 | 2.25 | 2.75 | 3.72 | 4.67 | 5.13 | 6.05 | 6.95 | 7.83 | 8.73 | 7.28 | 5.96 | 5.00 | 4.27 | 3.39 | 2.77 | 1.98 | 1.51 | 1.19 | 0 |
| 22 | 0.08 | 0.19 | 0.37 | 0.68 | 1.27 | 1.83 | 2.36 | 2.89 | 3.92 | 4.91 | 5.39 | 6.36 | 7.30 | 8.21 | 9.18 | 7.83 | 6.39 | 5.36 | 4.57 | 3.63 | 2.97 | 2.13 | 1.62 | 1.28 | 0 |
| 23 | 0.09 | 0.20 | 0.38 | 0.72 | 1.33 | 1.92 | 2.48 | 3.04 | 4.11 | 5.15 | 5.66 | 6.67 | 7.68 | 8.65 | 9.62 | 8.36 | 6.83 | 5.73 | 4.89 | 3.88 | 3.18 | 2.28 | 1.73 | 1.37 | 0 |
| 24 | 0.10 | 0.22 | 0.40 | 0.75 | 1.40 | 2.01 | 2.60 | 3.18 | 4.30 | 5.39 | 5.93 | 6.98 | 8.06 | 9.03 | 10.1 | 8.88 | 7.28 | 6.10 | 5.21 | 4.13 | 3.39 | 2.42 | 1.84 | 1.46 | 0 |
| 25 | 0.10 | 0.22 | 0.42 | 0.78 | 1.45 | 2.10 | 2.72 | 3.32 | 4.49 | 5.63 | 6.19 | 7.30 | 8.36 | 9.47 | 10.5 | 9.47 | 7.76 | 6.49 | 5.54 | 4.39 | 3.60 | 2.57 | 1.96 | 1.50 | 0 |
| 26 | 0.10 | 0.23 | 0.43 | 0.81 | 1.52 | 2.19 | 2.83 | 3.46 | 4.68 | 5.88 | 6.46 | 7.61 | 8.73 | 9.85 | 11.0 | 10.1 | 8.21 | 6.89 | 5.88 | 4.66 | 3.82 | 2.73 | 2.08 | 1.60 | 0 |
| 28 | 0.11 | 0.25 | 0.47 | 0.88 | 1.64 | 2.37 | 3.07 | 3.75 | 5.08 | 6.37 | 7.01 | 8.28 | 9.47 | 10.7 | 11.9 | 11.2 | 9.18 | 7.68 | 6.56 | 5.21 | 4.27 | 3.05 | 2.32 | 1.80 | 0 |
| 30 | 0.12 | 0.28 | 0.51 | 0.95 | 1.78 | 2.55 | 3.30 | 4.04 | 5.47 | 6.66 | 7.53 | 8.88 | 10.2 | 11.5 | 12.8 | 12.5 | 10.1 | 8.50 | 7.28 | 5.78 | 4.73 | 3.39 | 2.57 | 2.00 | 0 |
| 32 | 0.13 | 0.29 | 0.54 | 1.01 | 1.90 | 2.74 | 3.54 | 4.33 | 5.86 | 7.36 | 8.06 | 9.55 | 11.0 | 12.3 | 13.7 | 13.7 | 11.2 | 9.40 | 8.06 | 6.37 | 5.21 | 3.73 | 2.80 | 2.20 | 0 |
| 35 | 0.14 | 0.32 | 0.60 | 1.12 | 2.10 | 3.01 | 3.91 | 4.77 | 6.46 | 8.13 | 8.88 | 10.5 | 12.1 | 13.6 | 15.1 | 15.7 | 12.8 | 10.7 | 9.18 | 7.28 | 5.96 | 4.27 | 3.20 | 2.50 | 0 |
| 40 | 0.16 | 0.37 | 0.69 | 1.30 | 2.42 | 3.48 | 4.51 | 5.51 | 7.46 | 9.33 | 10.3 | 12.2 | 14.0 | 15.7 | 17.5 | 19.2 | 15.7 | 13.1 | 11.2 | 8.88 | 7.28 | 5.21 | 4.00 | 3.20 | 0 |
| 45 | 0.19 | 0.43 | 0.79 | 1.47 | 2.75 | 3.95 | 5.13 | 6.27 | 8.50 | 10.6 | 11.7 | 13.8 | 15.8 | 17.8 | 19.8 | 22.8 | 18.7 | 15.7 | 13.4 | 10.6 | 8.73 | 6.50 | 5.00 | 4.00 | 0 |
| วิธีการคำนวณ | A | | | | | B | | | | | C | | | | | | | | | | | | | | |

A:การหล่อลิ้นโดยการหยด B:การหล่อลิ้นโดยมีอ่างน้ำมัน C:การหล่อลิ้นโดยการบังคับให้หมุนเวียนด้วยบี้ม ใช้ไม่ได้รับการเลือกใช้ประเภท CHES

CHE60 (โซ่เดี่ยว) (kW)

| จำนวนฟันจวนโซ่เล็ก | ความเร็วรอบของจวนโซ่เล็ก (rpm) | | | | | | | | | | | | | | | | | | | | | | | | |
|--------------------|--------------------------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|
| | 10 | 25 | 50 | 100 | 150 | 200 | 300 | 400 | 500 | 600 | 700 | 800 | 900 | 1000 | 1100 | 1200 | 1400 | 1600 | 1800 | 2000 | 2500 | 3000 | 3500 | 4000 | 4500 |
| 9 | 0.11 | 0.25 | 0.46 | 0.87 | 1.25 | 1.61 | 2.33 | 3.01 | 3.69 | 4.34 | 4.98 | 5.62 | 6.25 | 6.87 | 7.45 | 6.54 | 5.19 | 4.25 | 3.56 | 3.04 | 2.18 | 1.66 | 1.31 | 1.07 | 0.90 |
| 10 | 0.12 | 0.28 | 0.52 | 0.97 | 1.40 | 1.81 | 2.61 | 3.38 | 4.13 | 4.86 | 5.59 | 6.30 | 7.00 | 7.68 | 8.36 | 7.68 | 6.08 | 4.98 | 4.17 | 3.56 | 2.55 | 1.94 | 1.54 | 1.26 | 1.05 |
| 11 | 0.13 | 0.31 | 0.57 | 1.07 | 1.54 | 2.01 | 2.89 | 3.74 | 4.57 | 5.39 | 6.19 | 6.98 | 7.76 | 8.50 | 9.33 | 8.88 | 7.02 | 5.74 | 4.81 | 4.11 | 2.94 | 2.24 | 1.78 | 1.45 | 1.22 |
| 12 | 0.15 | 0.34 | 0.63 | 1.18 | 1.70 | 2.20 | 3.17 | 4.11 | 5.03 | 5.92 | 6.80 | 7.68 | 8.50 | 9.40 | 10.2 | 10.1 | 7.98 | 6.54 | 5.48 | 4.68 | 3.35 | 2.55 | 2.02 | 1.66 | 1.39 |
| 13 | 0.16 | 0.37 | 0.69 | 1.29 | 1.86 | 2.40 | 3.46 | 4.48 | 5.48 | 6.45 | 7.42 | 8.36 | 9.33 | 10.2 | 11.1 | 11.3 | 9.03 | 7.38 | 6.18 | 5.28 | 3.77 | 2.87 | 2.28 | 1.87 | 1.50 |
| 14 | 0.18 | 0.40 | 0.75 | 1.40 | 2.01 | 2.60 | 3.74 | 4.86 | 5.94 | 6.99 | 8.06 | 9.03 | 10.1 | 11.0 | 12.1 | 12.7 | 10.1 | 8.28 | 6.91 | 5.90 | 4.22 | 3.22 | 2.55 | 2.09 | 1.67 |
| 15 | 0.19 | 0.43 | 0.81 | 1.50 | 2.16 | 2.80 | 4.04 | 5.28 | 6.39 | 7.53 | 8.65 | 9.77 | 10.8 | 11.9 | 13.0 | 14.0 | 11.2 | 9.18 | 7.68 | 6.54 | 4.68 | 3.56 | 2.83 | 2.31 | 1.87 |
| 16 | 0.20 | 0.46 | 0.87 | 1.61 | 2.32 | 3.01 | 4.33 | 5.61 | 6.86 | 8.06 | 9.25 | 10.4 | 11.6 | 12.8 | 14.0 | 15.1 | 12.3 | 10.1 | 8.43 | 7.21 | 5.15 | 3.92 | 3.11 | 2.55 | 2.00 |
| 17 | 0.22 | 0.49 | 0.93 | 1.72 | 2.48 | 3.21 | 4.63 | 5.99 | 7.32 | 8.65 | 9.92 | 11.2 | 12.5 | 13.7 | 14.8 | 16.1 | 13.5 | 11.0 | 9.25 | 7.91 | 5.65 | 4.30 | 3.41 | 2.79 | 2.20 |
| 18 | 0.23 | 0.52 | 0.98 | 1.83 | 2.63 | 3.42 | 4.92 | 6.37 | 7.76 | 9.18 | 10.5 | 11.9 | 13.2 | 14.5 | 15.8 | 17.1 | 14.7 | 12.0 | 10.1 | 8.58 | 6.15 | 4.68 | 3.72 | 3.04 | 2.40 |
| 19 | 0.25 | 0.56 | 1.04 | 1.94 | 2.79 | 3.62 | 5.21 | 6.75 | 8.28 | 9.70 | 11.2 | 12.6 | 14.0 | 15.4 | 16.8 | 18.1 | 16.0 | 13.1 | 10.9 | 9.33 | 6.68 | 5.08 | 4.03 | 3.30 | 2.60 |
| 20 | 0.26 | 0.59 | 1.10 | 2.05 | 2.95 | 3.83 | 5.51 | 7.14 | 8.73 | 10.3 | 11.8 | 13.4 | 14.8 | 16.3 | 17.8 | 19.2 | 17.2 | 14.1 | 11.8 | 10.1 | 7.21 | 5.48 | 4.35 | 3.60 | 2.90 |
| 21 | 0.27 | 0.62 | 1.16 | 2.16 | 3.11 | 4.03 | 5.80 | 7.53 | 9.18 | 10.8 | 12.5 | 14.0 | 15.6 | 17.2 | 18.7 | 20.2 | 18.5 | 15.1 | 12.7 | 10.8 | 7.76 | 5.90 | 4.68 | 3.80 | 3.10 |
| 22 | 0.28 | 0.65 | 1.22 | 2.28 | 3.27 | 4.24 | 6.11 | 7.91 | 9.70 | 11.4 | 13.1 | 14.8 | 16.4 | 18.1 | 19.7 | 21.3 | 19.8 | 16.3 | 13.6 | 11.6 | 8.28 | 6.33 | 5.02 | 4.10 | 3.40 |
| 23 | 0.30 | 0.69 | 1.28 | 2.38 | 3.43 | 4.45 | 6.41 | 8.28 | 10.1 | 11.9 | 13.7 | 15.5 | 17.2 | 18.9 | 20.7 | 22.3 | 21.2 | 17.4 | 14.5 | 12.5 | 8.88 | 6.77 | 5.36 | 4.40 | 3.70 |
| 24 | 0.31 | 0.72 | 1.34 | 2.50 | 3.60 | 4.66 | 6.71 | 8.65 | 10.6 | 12.5 | 14.4 | 16.2 | 18.1 | 19.8 | 21.6 | 23.3 | 22.6 | 18.5 | 15.5 | 13.3 | 9.47 | 7.21 | 5.72 | 4.70 | 4.00 |
| 25 | 0.33 | 0.75 | 1.40 | 2.61 | 3.76 | 4.86 | 7.01 | 9.10 | 11.1 | 13.1 | 15.0 | 16.9 | 18.9 | 20.7 | 22.6 | 24.4 | 24.0 | 19.7 | 16.5 | 14.1 | 10.1 | 7.68 | 6.08 | 5.00 | 4.30 |
| 26 | 0.34 | 0.78 | 1.45 | 2.72 | 3.92 | 5.08 | 7.31 | 9.47 | 11.6 | 13.7 | 15.7 | 17.7 | 19.7 | 21.6 | 23.6 | 25.4 | 25.5 | 20.9 | 17.5 | 14.9 | 10.7 | 8.13 | 6.45 | 5.40 | 4.70 |
| 28 | 0.37 | 0.84 | 1.58 | 2.95 | 4.24 | 5.50 | 7.91 | 10.3 | 12.5 | 14.8 | 17.0 | 19.2 | 21.3 | 23.4 | 25.5 | 27.6 | 28.5 | 23.3 | 19.5 | 16.7 | 11.9 | 9.10 | 7.50 | 6.00 | 5.30 |
| 30 | 0.40 | 0.91 | 1.70 | 3.18 | 4.57 | 5.92 | 8.50 | 11.0 | 13.5 | 16.0 | 18.3 | 20.7 | 23.0 | 25.2 | 27.5 | 29.7 | 31.6 | 25.9 | 21.7 | 18.5 | 13.3 | 10.1 | 8.50 | 7.00 | 6.40 |
| 32 | 0.43 | 0.98 | 1.83 | 3.40 | 4.90 | 6.36 | 9.18 | 11.9 | 14.5 | 17.1 | 19.6 | 22.2 | 24.6 | 27.1 | 29.5 | 31.9 | 34.8 | 28.5 | 23.9 | 20.4 | 14.6 | 11.1 | 9.50 | 8.00 | 7.40 |
| 35 | 0.47 | 1.07 | 2.01 | 3.75 | 5.40 | 7.00 | 10.1 | 13.1 | 16.0 | 18.8 | 21.6 | 24.4 | 27.1 | 29.8 | 32.5 | 35.1 | 39.8 | 32.6 | 27.3 | 23.3 | 16.7 | 12.7 | 10.0 | 8.50 | 7.90 |
| 40 | 0.54 | 1.25 | 2.32 | 4.33 | 6.24 | 8.06 | 11.6 | 15.1 | 18.4 | 21.7 | 25.0 | 28.1 | 31.3 | 34.4 | 37.5 | 40.6 | 46.6 | 39.8 | 33.3 | 28.5 | 20.4 | 15.0 | 11.0 | 9.00 | 8.40 |
| 45 | 0.62 | 1.41 | 2.63 | 4.92 | 7.09 | 9.18 | 13.2 | 17.2 | 21.0 | 24.7 | 28.3 | 32.0 | 35.6 | 39.1 | 42.6 | 46.0 | 52.9 | 47.5 | 39.8 | 34.0 | 24.3 | 18.0 | 13.0 | 10.0 | 9.00 |
| วิธีการคำนวณ | A | | | | | B | | | | | C | | | | | | | | | | | | | | |

A:การหล่อลิ้นโดยการหยด B:การหล่อลิ้นโดยมีอ่างน้ำมัน C:การ