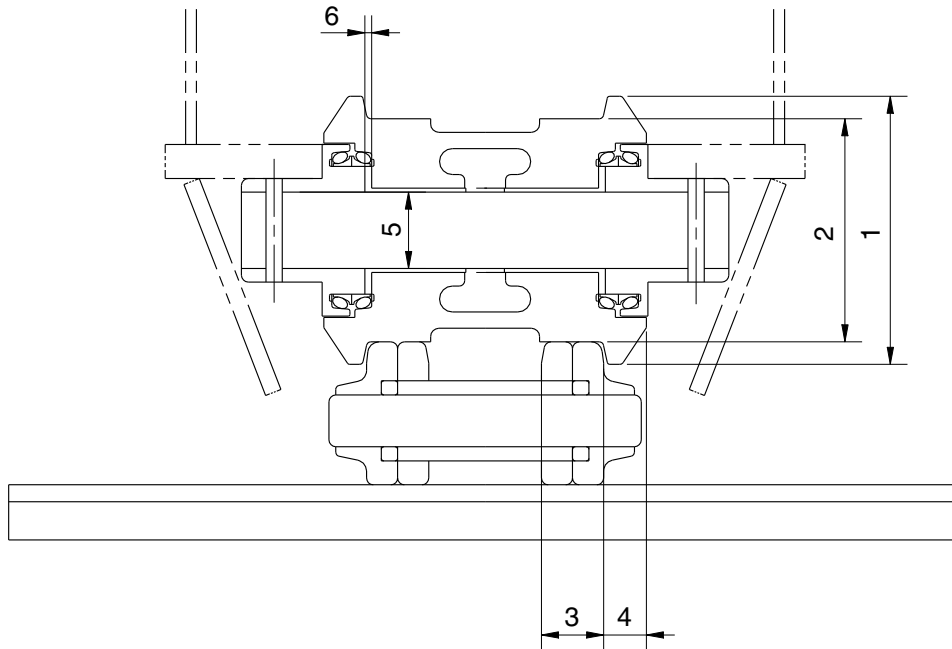


## GROUP 3 TRACK AND WORK EQUIPMENT

### 1. TRACK

#### 1) TRACK ROLLER

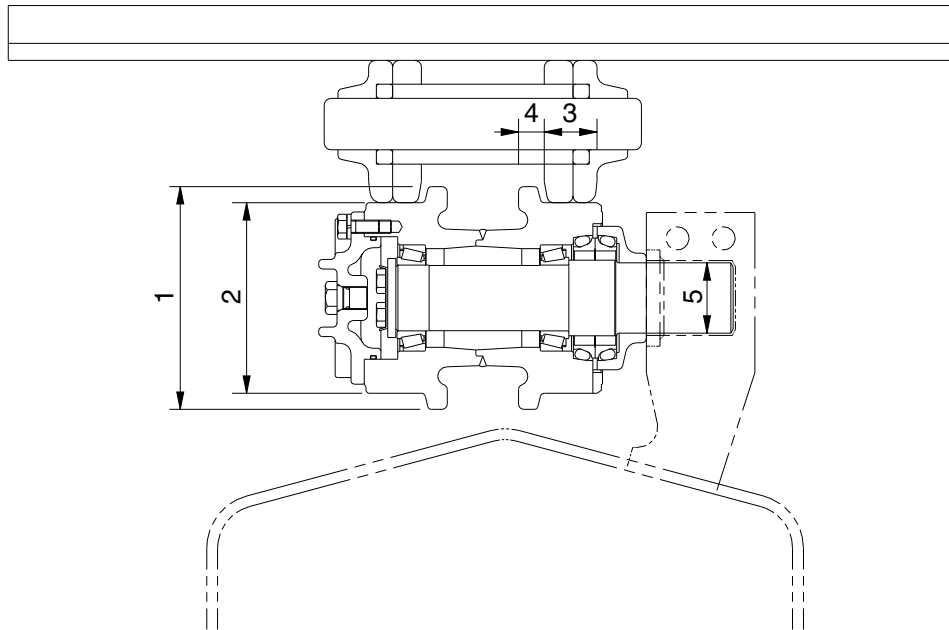


21037MS01

Unit : mm

| No. | Check item                           | Criteria                  |                    |                    |                 | Remedy             |
|-----|--------------------------------------|---------------------------|--------------------|--------------------|-----------------|--------------------|
|     |                                      | Standard size             |                    | Repair limit       |                 |                    |
| 1   | Outside diameter of flange           | ø 200                     |                    | -                  |                 | Rebuild or replace |
| 2   | Outside diameter of tread            | ø 160                     |                    | ø 148              |                 |                    |
| 3   | Width of tread                       | 48                        |                    | 54                 |                 |                    |
| 4   | Width of flange                      | 21.5                      |                    | 15.5               |                 |                    |
| 5   | Clearance between shaft and bushing  | Standard size & tolerance |                    | Standard clearance | Clearance limit | Replace bushing    |
|     |                                      | Shaft                     | Hole               |                    |                 |                    |
|     |                                      | ø 70 -0.29<br>-0.33       | ø 70.1 +0.046<br>0 |                    |                 |                    |
| 6   | Side clearance of roller (both side) | Standard clearance        |                    | Clearance limit    |                 | Replace            |
|     |                                      | 0.2 to 1.2                |                    | 2.0                |                 |                    |

## 2) CARRIER ROLLER

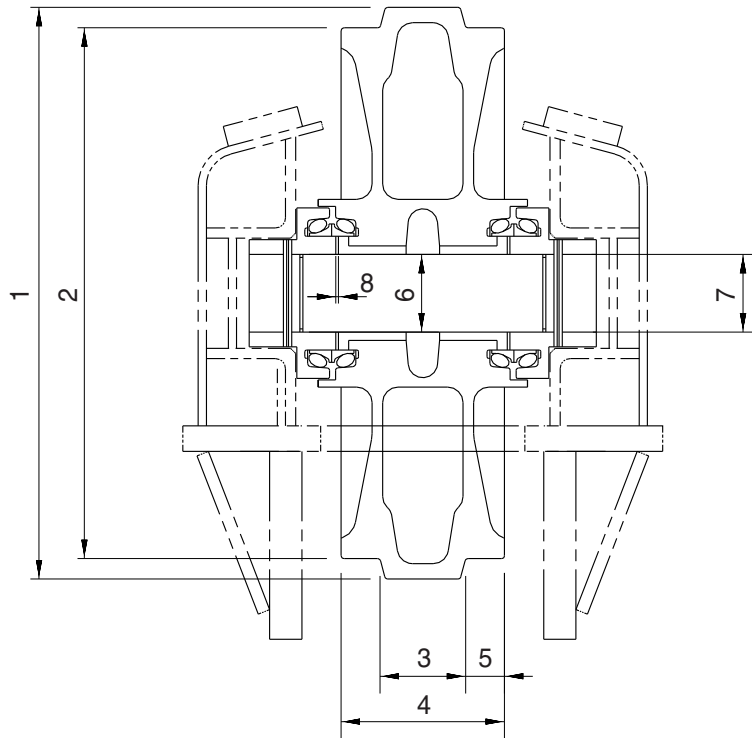


21037MS02

Unit : mm

| No. | Check item                          | Criteria      |               |              |                    | Remedy             |
|-----|-------------------------------------|---------------|---------------|--------------|--------------------|--------------------|
| 1   | Outside diameter of flange          | Standard size |               | Repair limit |                    | Rebuild or replace |
|     |                                     | ø 169         |               | -            |                    |                    |
| 2   | Outside diameter of tread           | ø 144         |               | ø 134        |                    |                    |
| 3   | Width of tread                      | 44            |               | 49           |                    |                    |
| 4   | Width of flange                     | 17            |               | -            |                    |                    |
| 5   | Clearance between shaft and bushing | Standard size | tolerance     |              | Standard clearance | Clearance limit    |
|     |                                     |               | Shaft         | Hole         |                    |                    |
|     |                                     | ø 55          | -0.05<br>-0.1 | +0.3<br>+0.1 | 0.15<br>~ 0.40     | 2.0                |

### 3) IDLER

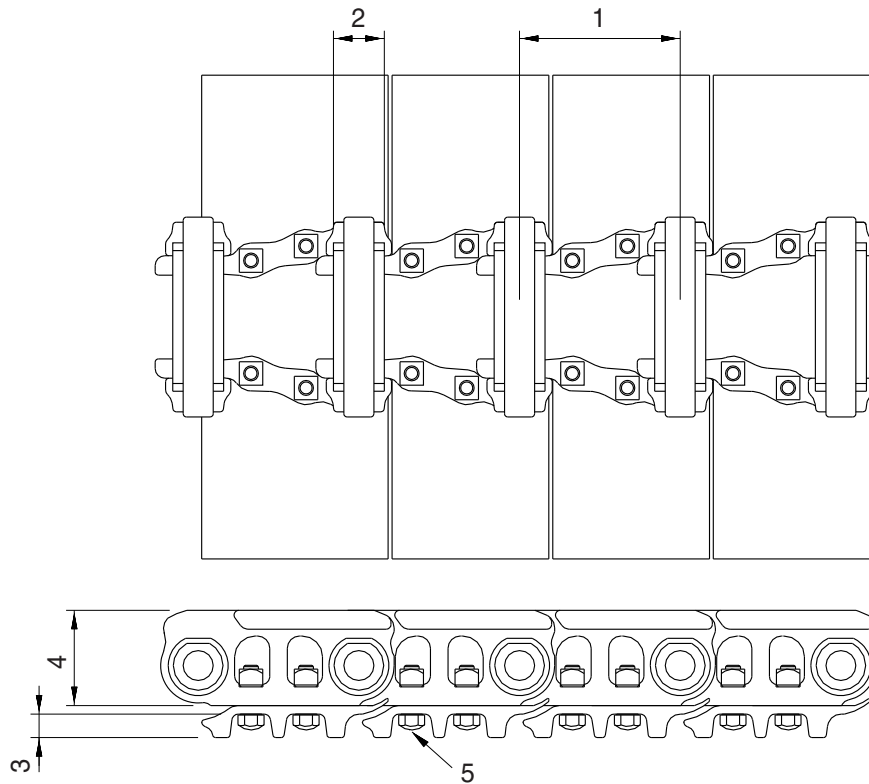


21037MS03

Unit : mm

| No. | Check item                          | Criteria                                      |   |                    |                 | Remedy             |                 |
|-----|-------------------------------------|---|---|--------------------|-----------------|--------------------|-----------------|
|     |                                     | Standard size                                 |   | Repair limit       |                 |                    |                 |
| 1   | Outside diameter of protrusion      | ø 560   |   | -                  |                 | Rebuild or replace |                 |
| 2   | Outside diameter of tread           | ø 520   |   | ø 510              |                 |                    |                 |
| 3   | Width of protrusion                 | 84  |   | -                  |                 |                    |                 |
| 4   | Total width                         | 160   |   | -                  |                 |                    |                 |
| 5   | Width of tread                      | 38  |   | 43                 |                 |                    |                 |
| 6   | Clearance between shaft and bushing | Standard size & tolerance                     |   | Standard clearance | Clearance limit | Replace bushing    |                 |
|     |                                     | Shaft   | Hole  |                    |                 |                    |                 |
|     |                                     | ø 75 $\begin{matrix} 0 \\ -0.03 \end{matrix}$ | ø 75.35 $\begin{matrix} +0.05 \\ 0 \end{matrix}$  | 0.35 to 0.43       | 2.0             |                    |                 |
| 7   | Clearance between shaft and support | ø 75 $\begin{matrix} 0 \\ -0.03 \end{matrix}$ | ø 75 $\begin{matrix} +0.07 \\ +0.03 \end{matrix}$ | 0.03 to 0.1        | 1.2             |                    | Replace         |
| 8   | Side clearance of idler (both side) | Standard clearance                            |   | Clearance limit    |                 |                    | Replace bushing |
|     |                                     | 0.25 to 1.2                                   |   | 2.0                |                 |                    |                 |

#### 4) TRACK

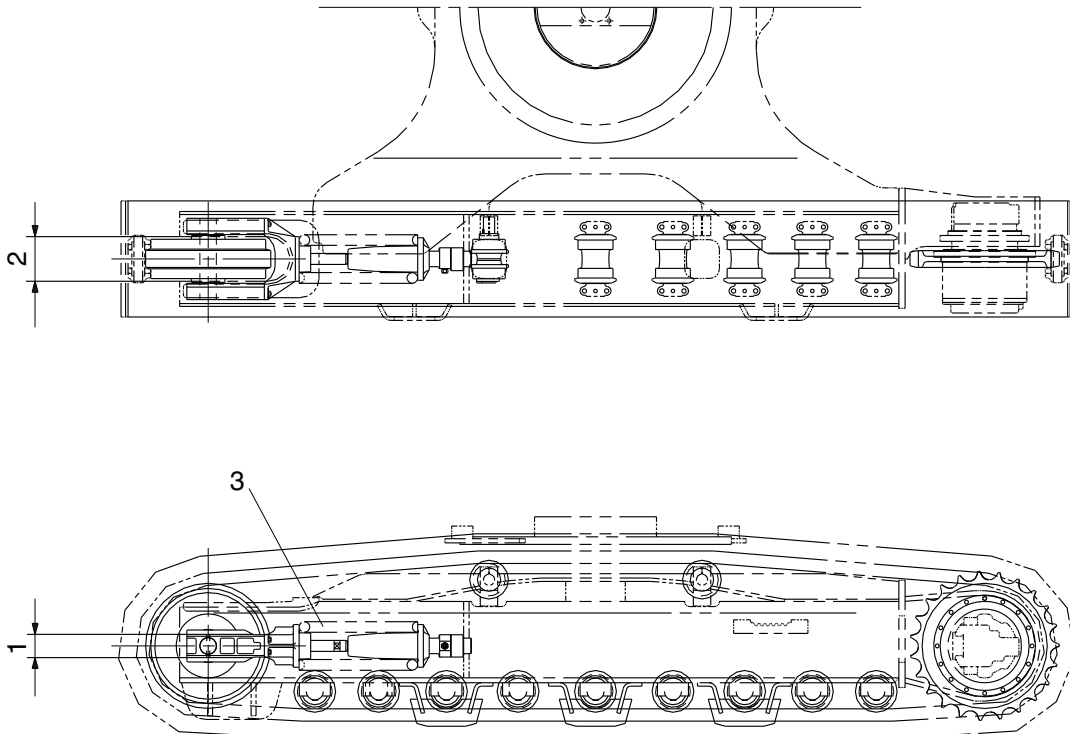


21037MS04

Unit : mm

| No. | Check item                  | Criteria                                       |              | Remedy             |
|-----|-----------------------------|--|--------------|--------------------|
|     |                             | Standard size                                  | Repair limit |                    |
| 1   | Link pitch                  | 190  | 199          | Turn or replace    |
| 2   | Outside diameter of bushing | ∅ 59   | ∅ 51         | Rebuild or replace |
| 3   | Height of grouser           | 26   | 16           |                    |
| 4   | Height of link              | 105  | 97           | Retighten          |
| 5   | Tightening torque           | Initial tightening torque : $78 \pm 8$ kgf · m |              |                    |

## 5) TRACK FRAME AND RECOIL SPRING

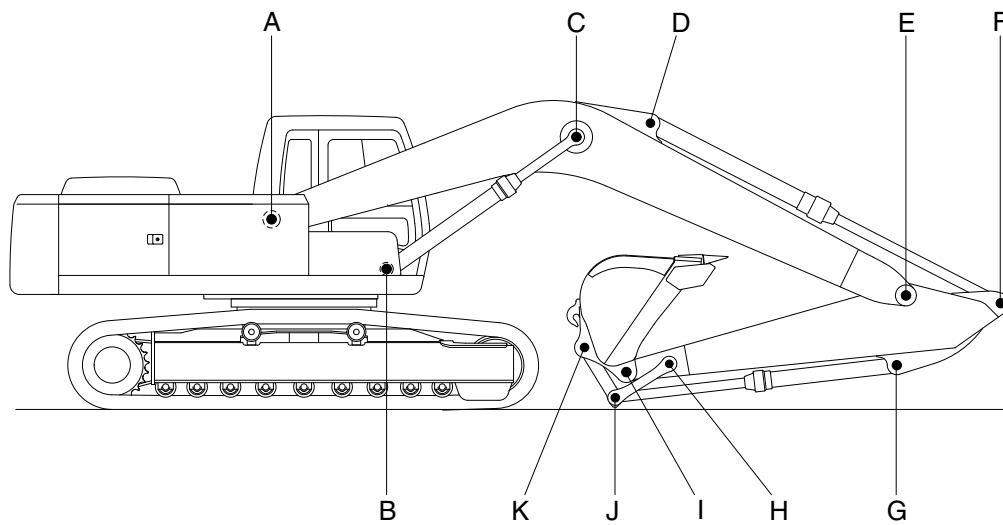


21037MS05

Unit : mm

| No. | Check item                      | Criteria      |                     |                   |              | Remedy             |         |
|-----|---------------------------------|---------------|---------------------|-------------------|--------------|--------------------|---------|
|     |                                 |               | Standard size       | Tolerance         | Repair limit |                    |         |
| 1   | Vertical width of idler guide   | Track frame   | 113                 | +2<br>0           | 117          | Rebuild or replace |         |
|     |                                 | Idler support | 110                 | 0<br>-1.5         | 106          |                    |         |
| 2   | Horizontal width of idler guide | Track frame   | 272                 | +2<br>0           | 276          |                    |         |
|     |                                 | Idler support | 270                 | -                 | 267          |                    |         |
| 3   | Recoil spring                   | Standard size |                     |                   | Repair limit |                    | Replace |
|     |                                 | Free length   | Installation length | Installation load | Free length  | Installation load  |         |
|     |                                 | ∅ 235 × 627   | 508                 | 16315kg           | -            | 13052kg            |         |

## 2. WORK EQUIPMENT



21077MS20

Unit : mm

| Mark | Measuring point<br>(Pin and Bushing) | Normal<br>value | Pin                         |                 | Bushing                     |                 | Remedy<br>&<br>Remark |
|------|--------------------------------------|-----------------|-----------------------------|-----------------|-----------------------------|-----------------|-----------------------|
|      |                                      |                 | Recomm.<br>service<br>limit | Limit<br>of use | Recomm.<br>service<br>limit | Limit<br>of use |                       |
| A    | Boom Rear                            | 100             | 99                          | 98.5            | 100.5                       | 101             | Replace               |
| B    | Boom Cylinder Head                   | 90              | 89                          | 88.5            | 90.5                        | 91              | "                     |
| C    | Boom Cylinder Rod                    | 100             | 99                          | 98.5            | 100.5                       | 101             | "                     |
| D    | Arm Cylinder Head                    | 90              | 89                          | 88.5            | 90.5                        | 91              | "                     |
| E    | Boom Front                           | 100             | 99                          | 98.5            | 100.5                       | 101             | "                     |
| F    | Arm Cylinder Rod                     | 90              | 89                          | 88.5            | 90.5                        | 91              | "                     |
| G    | Bucket Cylinder Head                 | 90              | 89                          | 88.5            | 90.5                        | 91              | "                     |
| H    | Arm Link                             | 80              | 79                          | 78.5            | 80.5                        | 81              | "                     |
| I    | Bucket and Arm Link                  | 90              | 89                          | 88.5            | 90.5                        | 91              | "                     |
| J    | Bucket Cylinder Rod                  | 80              | 79                          | 78.5            | 80.5                        | 81              | "                     |
| K    | Bucket Link                          | 90              | 89                          | 88.5            | 90.5                        | 91              | "                     |