

## Internal and External Retaining Rings

For axial assembly. Holes for pliers make installation and removal easy. Inch-system rings meet ASME standards; metric-system rings meet DIN standards.
Note: Zinc-plated steel retaining rings are also available; on Grainger.com, search for "retaining rings."

| For <br> Bore <br> Dia. | Fits Groove Dia. | Fits Groove Width | Free O.D. Thickness |  | Item No. |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Internal |  |  |  |  |  |  |
| Stainless Steel |  |  |  |  |  |  |
| 1/4 in | 0.268 in | 0.02 in | 0.28 in | 0.015 in | 5DB51 |  |
| 5/16 in | 0.33 in | 0.02 in | 0.346 in | 0.015 in | 5DB53 |  |
| $3 / 8$ in | 0.397 in | 0.029 in | 0.415 in | 0.025 in | 5DB55 |  |
| 7/16 in | 0.461 in | 0.029 in | 0.482 in | 0.025 in | 5DB57 | 10 |
| 1/2 in | 0.53 in | 0.039 in | 0.548 in | 0.035 in | 5DB59 | 10 |
| 9/16 in | 0.596 in | 0.039 in | 0.62 in | 0.035 in | 5DB61 |  |
| $5 / 8$ in | 0.665 in | 0.039 in | 0.694 in | 0.035 in | 5DB63 | 10 |
| T11/16 in | 0.732 in | 0.039 in | 0.763 in | 0.035 in | 5DB65 |  |
| 3/4 in | 0.796 in | 0.039 in | 0.831 in | 0.035 in | 5DB67 |  |
| 77771000 in | 0.825 in | 0.046 in | 0.859 in | 0.042 in | 5DB69 |  |
| 13/16 in | 0.862 in | 0.046 in | 0.901 in | 0.042 in | 5DB71 |  |
| 7/8 in | 0.931 in | 0.046 in | 0.971 in | 0.042 in | 5DB73 | 5 |
| 15/16 in | 1.0 in | 0.046 in | 1.041 in | 0.042 in | 5DB77 |  |
| 1 in | 1.066 in | 0.046 in | 1.111 in | 0.042 in | 5DB79 |  |
| $11 / 16$ in | 1.13 in | 0.056 in | 1.18 in | 0.05 in | 5DB83 |  |
| $11 / 8$ in | 1.197 in | 0.056 in | 1.249 in | 0.05 in | 5DB85 |  |
| $13 / 16$ in | 1.262 in | 0.056 in | 1.319 in | 0.05 in | 5DB87 |  |
| 15/16 in | 1.396 in | 0.056 in | 1.456 in | 0.05 in | 5DB91 |  |
| $13 / 8$ in | 1.461 in | 0.056 in | 1.526 in | 0.05 in | 5DB93 |  |
| 17/16 in | 1.528 in | 0.056 in | 1.596 in | 0.05 in | 5DB95 |  |
| $11 / 2$ in | 1.594 in | 0.056 in | 1.66 in | 0.05 in | 5DB97 |  |
| 1916 in | 1.658 in | 0.068 in | 1.734 in | 0.062 in | 5DB99 |  |
| $15 / 8$ in | 1.725 in | 0.068 in | 1.804 in | 0.062 in | 5DE11 |  |
| $7^{11 / 16}$ in | 1.792 in | 0.068 in | 1.874 in | 0.062 in | 5DE13 |  |
| $13 / 4$ in | 1.858 in | 0.068 in | 1.942 in | 0.062 in | 5DE15 |  |
| $17 / 8 \mathrm{in}$ | 1.989 in | 0.068 in | 2.072 in | 0.062 in | 5DE17 |  |
| 2 in | 2.122 in | 0.068 in | 2.21 in | 0.062 in | 5DE19 |  |
| $21 / 8$ in | 2.251 in | 0.086 in | 2.35 in | 0.078 in | 5DE21 |  |
| $21 / 4$ in | 2.382 in | 0.086 in | 2.49 in | 0.078 in | 5DE23 |  |
| $23 / 8$ in | 2.517 in | 0.086 in | 2.63 in | 0.078 in | 5DE25 |  |
| 27/16 in | 2.584 in | 0.086 in | 2.702 in | 0.078 in | 5DE27 |  |
| $21 / 2$ in | 2.648 in | 0.086 in | 2.775 in | 0.078 in | 5DE29 |  |
| $25 / 8$ in | 2.781 in | 0.103 in | 2.91 in | 0.093 in | 5DE31 |  |
| $23 / 4$ in | 2.914 in | 0.103 in | 3.05 in | 0.093 in | 5DE33 |  |
| 27/8 in | 3.051 in | 0.103 in | 3.191 in | 0.093 in | 5DE35 |  |
| 3 in | 3.182 in | 0.103 in | 3.325 in | 0.093 in | 5DE37 |  |


| For Bore Dia. | Fits Groove Dia. | Fits Groove Width | Free O.D | Thickness | Item No. | Pkg. Qty. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Internal Metric |  |  |  |  |  |  |
| Carbon Steel |  |  |  |  |  |  |
| 9 mm | 9.4 mm | 0.9 mm | 9.8 mm | 0.8 mm | 5DU62 | - |
| 10 mm | 10.4 mm | 1.1 mm | 10.8 mm | 1 mm | 5DU64 |  |
| 12 mm | 12.5 mm | 1.1 mm | 13.0 mm | 1 mm | 5DU68 |  |
| 14 mm | 14.6 mm | 1.1 mm | 15.1 mm | mm | 5DU69 |  |
| 16 mm | 16.8 mm | 1.1 mm | 17.3 mm | 1 mm | 5DU71 | 00 |
| 18 mm | 19.0 mm | 1.1 mm | 19.5 mm | 1 mm | 5DU73 |  |
| 20 mm | 21.0 mm | 1.1 mm | 21.5 mm | 1 mm | 5DU76 | 50 |
| 22 mm | 23.0 mm | 1.1 mm | 23.5 mm | mm | 5 DU78 | 50 |
| 24 mm | 25.2 mm | 1.3 mm | 25.9 mm | 1.2 mm | 5DU80 | 50 |
| 28 mm | 29.4 mm | 1.3 mm | 30.1 mm | 1.2 mm | 5DU82 | 50 |
| 32 mm | 33.7 mm | 1.3 mm | 34.4 mm | 1.2 mm | 5DU85 | 25 |
| 34 mm | 35.7 mm | 1.6 mm | 36.5 mm | 1.5 mm | 5DU87 | 1 |
| 40 mm | 42.5 mm | 1.85 mm | 43.5 mm | 1.75 mm | 5DU93 | 1 |
| 50 mm | 53.0 mm | 2.15 mm | 54.2 mm | 2 mm | 5DU95 |  |
| 60 mm | 63.0 mm | 2.15 mm | 64.2 mm | 2 mm | 5DU97 |  |
| 70 mm | 73.0 mm | 2.65 mm | 74.5 mm | 2.5 mm | 5DU99 | 1 |
| 80 mm | 83.5 mm | 2.65 mm | 85.5 mm | 2.5 mm | 5DV11 |  |
| Stainless Steel |  |  |  |  |  |  |
| 9 mm | 9.4 mm | 0.9 mm | 9.8 mm | 0.8 mm | 5CYo | 5 |
| 10 mm | 10.4 mm | 1.1 mm | 10.8 mm | 1 mm | 5CY82 | 5 |
| 12 mm | 12.5 mm | 1.1 mm | 13.0 mm | 1 mm | 5CY86 | 5 |
| 14 mm | 14.6 mm | 1.1 mm | 15.1 mm | 1 mm | 5CY88 | 5 |
| 16 mm | 16.8 mm | 1.1 mm | 17.3 mm | mm | 5 CY 90 | 5 |
| 18 mm | 19.0 mm | 1.1 mm | 19.5 mm | 1 mm | 5CY92 | 5 |
| 20 mm | 21.0 mm | 1.1 mm | 21.5 mm | mm | 5CY94 |  |
| 22 mm | 23.0 mm | 1.1 mm | 23.5 mm | 1 mm | 5CY96 |  |
| 24 mm | 25.2 mm | 1.3 mm | 25.9 mm | 1.2 mm | 5CY98 |  |
| 28 mm | 29.4 mm | 1.3 mm | 30.1 mm | 1.2 mm | 5DA10 | 1 |
| 32 mm | 33.7 mm | 1.3 mm | 34.4 mm | 1.2 mm | 5DA14 |  |
| 34 mm | 35.7 mm | 1.6 mm | 36.5 mm | 1.5 mm | 5DA16 |  |
| 40 m | 42.5 mm | 1.85 mm | 43.5 mm | 1.75 mm | 5DA22 |  |
| 50 mm | 53.0 mm | 2.15 mm | 54.2 mm | 2 mm | 5DA24 |  |
| 60 mm | 63.0 mm | 2.15 mm | 64.2 mm | 2 mm | 5DA26 |  |
| 70 mm | 73.0 mm | 2.65 mm | 74.5 mm | 2.5 mm | 5DA28 |  |
| 80 mm | 83.5 mm | 2.65 mm | 85.5 mm | 2.5 mm | 5DA30 | 1 |
| For Shaft Dia. | Fits Groove Dia. | Fits Groove Width | Fr | S | Item No. |  |
| External |  |  |  |  |  |  |
| Stainless Steel |  |  |  |  |  |  |
| $1 / 4$ in | 0.23 in | 0.029 in | 0.225 in | 0.025 in | 5DA59 | 10 |
| 9/32 in | 0.261 in | 0.029 in | 0.256 in | 0.025 in | 5DA61 | 10 |
| $5 / 16$ in | 0.29 in | 0.029 in | 0.281 in | 0.025 in | 5DA63 |  |
| $3 / 8$ in | 0.352 in | 0.029 in | 0.338 in | 0.025 in | 5DA67 |  |
| 7/16 in | 0.412 in | 0.029 in | 0.395 in | 0.025 in | 5DA71 |  |
| $1 / 2$ in | 0.468 in | 0.039 in | 0.461 in | 0.035 in | 5DA73 | 10 |
| 9/16 in | 0.53 in | 0.039 in | 0.521 in | 0.035 in | 5DA75 | 0 |
| 19/32 in | 0.559 in | 0.039 in | 0.55 in | 0.035 in | 5DA77 |  |
| $5 / 8$ in | 0.588 in | 0.039 in | 0.579 in | 0.035 in | 5DA79 | 10 |
| $11 / 16$ in | 0.646 in | 0.046 in | 0.635 in | 0.042 in | 5DA81 | 10 |
| $3 / 4$ in | 0.704 in | 0.046 in | 0.693 in | 0.042 in | 5DA83 |  |
| $13 / 16$ in | 0.762 in | 0.046 in | 0.751 in | 0.042 in | 5DA85 | 10 |
| $7 / 8$ in | 0.821 in | 0.046 in | 0.81 in | 0.042 in | 5DA87 | 5 |
| 15/16 in | 0.882 in | 0.046 in | 0.867 in | 0.042 in | 5DA89 | 5 |
| 1 in | 0.94 in | 0.046 in | 0.925 in | 0.042 in | 5DA93 | 5 |
| $11 / 16$ in | 0.998 in | 0.056 in | 0.982 in | 0.05 in | 5DA95 | 5 |
| $11 / 8$ in | 1.059 in | 0.056 in | 1.041 in | 0.05 in | 5DA97 | 1 |
| $13 / 16$ in | 1.118 in | 0.056 in | 1.098 in | 0.05 in | 5DA99 | 1 |
| $11 / 4$ in | 1.176 in | 0.056 in | 1.156 in | 0.05 in | 5DB11 | 1 |
| $15 / 16$ in | 1.232 in | 0.056 in | 1.214 in | 0.05 in | 5DB13 |  |
| $13 / 8$ in | 1.291 in | 0.056 in | 1.272 in | 0.05 in | 5DB15 | 1 |
| $17 / 16$ in | 1.35 in | 0.056 in | 1.333 in | 0.05 in | 5DB17 | 1 |
| $11 / 2$ in | 1.406 in | 0.056 in | 1.387 in | 0.05 in | 5DB19 | 1 |
| $19 / 16$ in | 1.468 in | 0.068 in | 1.446 in | 0.062 in | 5DB21 |  |
| $15 / 8$ in | 1.529 in | 0.068 in | 1.503 in | 0.062 in | 5DB23 | 1 |
| $13 / 4$ in | 1.65 in | 0.068 in | 1.618 in | 0.062 in | 5DB27 | 1 |
| $17 / 8$ in | 1.769 in | 0.068 in | 1.735 in | 0.062 in | 5DB29 | 1 |
| 2 in | 1.886 in | 0.068 in | 1.85 in | 0.062 in | 5DB31 |  |
| $21 / 8$ in | 2.003 in | 0.086 in | 1.964 in | 0.078 in | 5DB33 | 1 |
| $21 / 4$ in | 2.12 in | 0.086 in | 2.081 in | 0.078 in | 5DB35 |  |
| $23 / 8$ in | 2.239 in | 0.086 in | 2.197 in | 0.078 in | 5DB37 |  |
| $27 / 16$ in | 2.299 in | 0.086 in | 2.255 in | 0.078 in | 5DB39 |  |
| $21 / 2$ in | 2.36 in | 0.086 in | 2.313 in | 0.078 in | 5DB41 | 1 |
| $25 / 8$ in | 2.481 in | 0.086 in | 2.428 in | 0.078 in | 5DB43 |  |
| $23 / 4$ in | 2.602 in | 0.103 in | 2.543 in | 0.093 in | 5DB45 |  |
| $27 / 8$ in | 2.721 in | 0.103 in | 2.659 in | 0.093 in | 5DB47 |  |
| 3 in | 2.838 in | 0.103 in | 2.775 in | 0.093 in | 5DB49 |  |


| For Shaft Dia. | Fits | Fits |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Groove | Groove |  |  | m |  |
|  | Dia. | Width | Free I.D | Thickness | - |  |
| External Metric |  |  |  |  |  |  |
| Carbon Steel |  |  |  |  |  |  |
| 4 mm | 3.8 mm | 0.5 mm | 3.7 mm | 0.4 mm | 5D |  |
| 5 mm | 4.8 mm | 0.7 mm | 4.7 mm | 0.6 mm |  |  |
| 6 mm | 5.7 mm | 0.8 mm | 5.6 mm | 0.7 mm |  |  |
| 8 mm | 7.6 mm | 0.9 mm | 7.4 mm | 0.8 mm |  | 0 |
| 9 mm | 8.6 mm | 1.1 mm | 8.4 mm | 1 mm |  |  |
| 10 mm | 9.6 mm | 1.1 mm | 9.3 mm | 1 mm | 5DE93 |  |
| 12 mm | 11.5 mm | 1.1 mm | 11 mm | mm | 5DE9 | 0 |
| 13 mm | 12.4 mm | 1.1 mm | 11.9 mm | mm | 5DE97 |  |
| 14 mm | 13.4 mm | 1.1 mm | 12.9 mm | 1 mm | 5DE99 |  |
| 15 mm | 14.3 mm | 1.1 mm | 13.8 mm | 1 mm | 5DU11 | 00 |
| 16 mm | 15.2 mm | 1.1 mm | 14.7 mm | mm | $5 \mathrm{DU13}$ | 00 |
| 17 mm | 16.2 mm | 1.1 mm | 15.7 mm | mm | 5DU15 |  |
| 18 mm | 17.0 mm | 1.3 mm | 16.5 mm | 1.2 mm | $5 \mathrm{DU17}$ | 00 |
| 19 mm | 18.0 mm | 1.3 mm | 17.5 mm | 1.2 mm | 5DU19 | 50 |
| 20 mm | 19.0 mm | 1.3 mm | 18.5 mm | 1.2 mm | 5DU21 | 5 |
| 24 mm | 22.9 mm | 1.3 mm | 22.2 mm | 1.2 mm | 5DU23 | 5 |
| 25 mm | 23.9 mm | 1.3 mm | 23.2 mm | 1.2 mm | 5DU25 | 25 |
| 28 mm | 26.6 mm | 1.6 mm | 25.9 mm | 1.5 mm | 5DU27 | 25 |
| 30 mm | 28.6 mm | 1.6 mm | 27.9 mm | 1.5 mm | 5DU29 | 25 |
| 32 mm | 30.3 mm | 1.6 mm | 29.6 mm | 1.5 mm | 5DU31 | 0 |
| 35 mm | 33.0 mm | 1.6 mm | 32.2 mm | 1.5 mm | 5DU35 | 0 |
| 40 mm | 37.5 mm | 1.85 mm | 36.5 mm | 1.75 mm | 5DU41 | 0 |
| 45 mm | 42.5 mm | 1.85 mm | 41.5 mm | 1.75 mm | 5DU43 | 5 |
| 50 mm | 47.0 mm | 2.15 mm | 45.8 mm | 2 mm | 5DU45 | 5 |
| 55 mm | 52.0 mm | 2.15 mm | 50.8 mm | 2 mm | 5DU47 | 5 |
| 60 m | 57.0 | 2.15 mm | 55.8 mm | 2 mm | 5DU50 | 5 |
| 65 mm | 62.0 mm | 2.65 mm | 60.8 mm | 2.5 mm | 5DU52 |  |
| 70 mm | 67.0 mm | 2.65 mm | 65.5 mm | 2.5 mm | 5DU54 | 1 |
| 75 m | 72.0 | 2.65 mm | 70.5 mm | 2.5 mm | 5DU56 | 1 |
| 80 m | 76.5 mm | 2.65 mm | 74.5 mm | 2.5 mm |  | 1 |
| Stainless Steel |  |  |  |  |  |  |
| 4 mm | 3.8 mm | 0.5 mm | 3.7 mm | 0.4 mm | 5 CY 4 | 10 |
| 5 mm | 4.8 mm | 0.7 mm | 4.7 mm | 0.6 mm | 5CY44 | 0 |
| 6 mm | 5.7 mm | 0.8 mm | 5.6 mm | 0.7 mm | 5CY46 | 0 |
| 8 mm | 7.6 mm | 0.9 mm | 7.4 mm | 0.8 mm | 5CY50 | 0 |
| 9 mm | 8.6 mm | 1.1 mm | 8.4 mm | 1 mm | 5CY52 |  |
| 10 mm | 9.6 mm | 1.1 mm | 9.3 mm | 1 mm | 5CY54 | 5 |
| 12 mm | 11.5 mm | 1.1 mm | 11 mm | 1 mm | 5CY56 | 5 |
| 13 mm | 12.4 mm | 1.1 mm | 11.9 mm | 1 mm | 5CY58 | 5 |
| 14 mm | 13.4 mm | 1.1 mm | 12.9 mm | 1 mm | 5CY60 | 5 |
| 15 mm | 14.3 mm | 1.1 mm | 13.8 mm | mm | 5CY62 | 5 |
| 16 mm | 15.2 mm | 1.1 mm | 14.7 mm | 1 mm | 5CY64 | 5 |
| 17 mm | 16.2 mm | 1.1 mm | 15.7 mm | mm | 5CY66 | 1 |
| 18 mm | 17.0 mm | 1.3 mm | 16.5 mm | 1.2 mm | 5CY68 |  |
| 19 mm | 18.0 mm | 1.3 mm | 17.5 mm | 1.2 mm | 5CY70 | 1 |
| 20 mm | 19.0 mm | 1.3 mm | 18.5 mm | 1.2 mm | 5CY72 | 1 |
| 24 mm | 22.9 mm | 1.3 mm | 22.2 mm | 1.2 mm | 5CY74 | 1 |
| 25 mm | 23.9 mm |  |  | 12 mm | 5CY76 |  |
| Heavy-Duty External |  |  |  |  |  |  |
| Carbon Steel |  |  |  |  |  |  |
| $1 / 2$ in | 0.468 in | 0.056 in | 0.46 in | 0.05 in | 5CE35 | 10 |
| $5 / 8$ in | 0.588 in | 0.056 in | 0.575 in | 0.05 in | 5CE37 | 10 |
| $3 / 4$ in | 0.704 in | 0.086 in | 0.689 in | 0.078 in | 5CE39 | 10 |
| 7/8 in | 0.821 in | 0.086 in | 0.804 in | 0.078 in | 5CE41 | 0 |
| 1 in | 0.938 in | 0.086 in | 0.906 in | 0.078 in | 5CE43 | 0 |
| $11 / 8$ in | 1.059 in | 0.103 in | 1.036 in | 0.093 in | 5CE45 | 10 |
| $11 / 4$ in | 1.174 in | 0.103 in | 1.15 in | 0.093 in | 5CE47 | 0 |
| $13 / 8$ in | 1.291 in | 0.103 in | 1.268 in | 0.093 in | 5CE49 | 0 |
| $11 / 2$ in | 1.406 in | 0.12 in | 1.38 in | 0.109 in | 5CE51 | 5 |
| $19 / 16$ in | 1.468 in | 0.12 in | 1.437 in | 0.109 in | 5CE53 | 5 |
| $13 / 4$ in | 1.65 in | 0.12 in | 1.608 in | 0.109 in | 5CE55 | 5 |
| 2 in | 1.88 in | 0.139 in | 1.84 in | 0.125 in | 5CE57 | 5 |

## Crescent External <br> Retaining Rings



Ideal for low-clearance applications where radial installation is preferred. Zinc yellow-plated steel. Meet ASME standard.

| For <br> Shaft Dia. | Fits Groove Dia. | Fits Groove Width | Free I.D. | Free O.D. | Thickness | Item <br> No. | Pkg. |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $5 / 32$ in | 0.135 in | 0.02 in | 0.131 in | 0.205 in | 0.015 in | 5 CU 25 |  |
| 3/19 in | 0.165 in | 0.02 in | 0.161 in | 0.244 in | 0.015 in |  |  |
|  |  |  |  |  |  |  |  |
| 7/32 in | 0.193 in | 0.029 in | 0.187 in | 0.275 in | 0.025 in | 5CU29 | 100 |
| 1/4 in | 0.22 in | 0.029 in | 0.211 in | 0.311 in | 0.025 in | 5CU31 | 100 |
| $9 / 32$ in | 0.247 in | 0.029 in | 0.242 in | 0.346 in | 0.025 in | 5CU33 | 100 |
| $5 / 16$ in | 0.276 in | 0.029 in | 0.27 in | 0.376 in | 0.025 in | 5CU35 | 100 |
| $3 / 8$ in | 0.335 in | 0.029 in | 0.328 in | 0.448 in | 0.025 in | 5CU37 | 100 |
| 7/16 in | 0.393 in | 0.029 in | 0.386 in | 0.517 in | 0.025 in | 5CU39 | 100 |
| $1 / 2$ in | 0.45 in | 0.039 in | 0.441 in | 0.581 in | 0.035 in | 5CU41 | 100 |
| 9/16 in | 0.507 in | 0.039 in | 0.497 in | 0.653 in | 0.035 in | 5 CU 43 | 50 |
| $5 / 8$ in | 0.563 in | 0.039 in | 0.553 in | 0.715 in | 0.035 in | $5 \mathrm{CU45}$ | 100 |
| $3 / 4$ in | 0.676 in | 0.046 in | 0.665 in | 0.845 in | 0.042 in | $5 \mathrm{CU47}$ | 50 |
| 1 in | 0.9 in | 0.046 in | 0.887 in | 1.13 in | 0.042 in | 5CU49 | 50 |
| $11 / 8$ in | 1.013 in | 0.056 in | 0.997 in | 1.267 in | 0.05 in | 5CU51 | 25 |
| $11 / 4$ in | 1.126 in | 0.056 in | 1.11 in | 1.415 in | 0.05 in | 5CU53 | 25 |

