

# Bag full of wisdom when you are in trouble

No.131

## 【Question】



We are a company working in camera repair. A customer brought in a camera with a damaged shutter release screw. We believe that the screw can be restored by re-threading (cleaning up) the threads, but is there a tap available that can be used for this re-threading process?

## 【Answer】

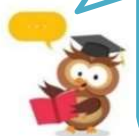
We have RLS-HT: Hand Taps for Camera Release Threads. The internal threads are tapered, so when re-cutting the threads, take care not to further damage them. Below, we provide details of the camera release mounting screw and the specifications of the RLS-HT for your reference.



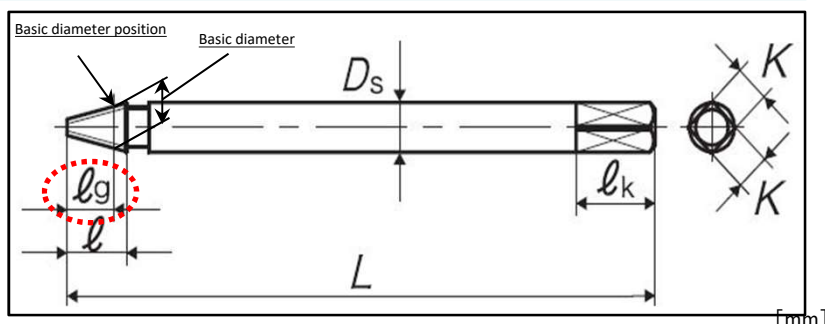
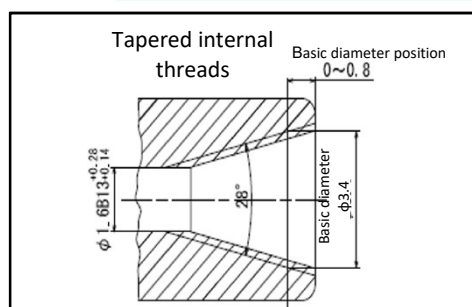
Hand Taps for Camera Release Threads RLS-HT



## 【Explanation】

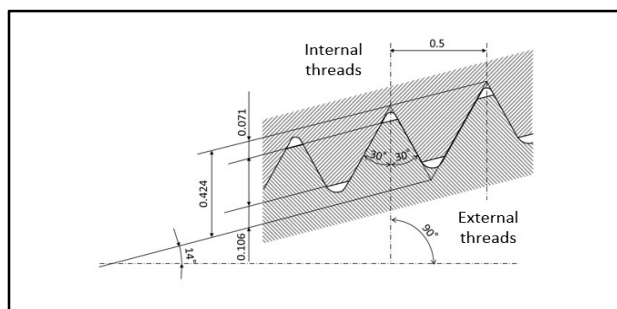
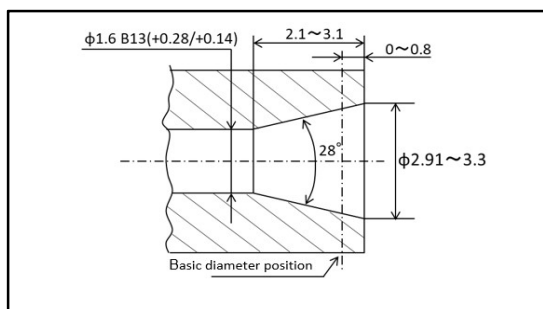


The camera release mounting screw (JIS B 7104) uses a 28° tapered thread. When cutting with a tap, the tool needs to be inserted up to the basic diameter position ( $\phi 3.4$ ). For the RLS-HT tap, this basic diameter position ( $\phi 3.4$ ) is set **4.15 mm** from the tip of the tap. So during machining, make sure to insert the tap to that depth. Since the tolerance for the basic diameter position is **0–0.8 mm**, adjusting the insertion depth to about **4.15–4.95 mm** will ensure the finished thread meets the standard.



Size	Chamfer	Basic diameter	L	l	lg	Ds	K	lk	Number of flutes
3.4 x 0.5 x 28°	—	3.4	52	5.25	4.15	4	3	7	3

**【Advice】** Please refer to the figures below for the geometries of the bored hole and the threads profile.



In the camera release screw standard, there is also a parallel internal thread of M3.4 × 0.5, for which the tap must be specially manufactured.