

INNOVATIVE HIGHLAND ENDURING HIGHLAND

连续抽油杆的技术优势

- 1、降低抽油杆失效频率。普通抽油杆联接部分（接箍、螺纹接头、锻造部分和锻造加热过渡区）的失效数占据总失效数的65%–80%，而钢质连续抽油杆的设计取消了联接件，从而大大减少了抽油杆的失效频率。
- 2、减少抽油杆与油管的磨损。钢质连续抽油杆与油管之间是线接触，而普通抽油杆为点接触，这样就增加了抽油杆与油管的接触长度，同时二者的承压面积也大大增加，使磨损大为减少。
- 3、降低抽油杆工作应力。钢质连续杆无接箍和螺纹，并根据每口井井况设计成锥形，其质量可比同样长的普通杆轻8%–10%，因此，相比普通杆有效提高了杆柱的可靠性，同时杆柱重量减轻，实现节能。
- 4、连续杆杆柱中间没有了接箍，使油管内的环空面积增大，油井生产运行中，减小液流阻力，使井液更容易举升，实现提高泵效，增加油井产液量。
- 5、连续抽油杆为同一材质，不存在电位差和电化学腐蚀。
- 6、可用于小直径的油管，节约油管使用成本。
- 7、单井单杆，易于管理。
- 8、提高作业速度，减轻劳动强度。利用连续杆作业车起下钢质连续抽油杆，可大大提高作业速度，减少油井倒井时间，从而提高产量和效益。

Technical Advantages of Coiled Rod

- 1、Reduce sucker rod failure frequency. The failure data of connection section (coupling, thread connector, forging part and forging heat transition area) of common sucker rod accounts for 65%–80% of total failure data, while the steel sucker rod has no connections so that it can decrease the failure frequency of the sucker rod greatly.
- 2、Reduce wear between sucker rod and tubing. The contact type of steel sucker rod and tubing is line contact which increases the length of contact and bearing area significantly to reduce wear, while the contact type of common sucker rod and tubing is point contact.
- 3、Reduce sucker rod working stress. The steel sucker rod has no couplings and threads and can be designed to taper shape according to well conditions. The weight is lighter 8%–10% than the common rod's with same length. So the steel sucker rod can increase the reliability of the rod with lighter quality to save energy.
- 4、Increase well production. The continuous sucker rod has no couplings, thus the annulus between tubings increased. It can decrease flow resistance so as to lift fluid more easily to improve pump efficiency and increase well output.
- 5、No electrical potential difference and electrochemical corrosion. The sucker rod is made of same material, so it has no electrical potential difference and electrochemical corrosion.
- 6、Saving cost. It can be used for small radius tubing to save cost.
- 7、Manage easily due to single well with single rod.
- 8、Improve the service efficiency and lighten the labor intensity. It can improve service efficiency and decrease transporting time between wells to increase well production and profits through the service truck of continuous steel sucker rod.

作业设备

Service Rig

钢质连续抽油杆起下作业是通过专门的起下设备起下，目前我公司拥有各类起下设备 10 余套。专用起下设备施工不仅起下速度快，而且大大降低了工人的劳动强度。车载作业机移动方便快捷，可以进行断杆打捞作业，移动式焊接机可以现场将断杆焊接组配好下井开抽，大大减少了作业时间，提高了作业效率。

利用连续抽油杆及作业服务，还可以实现非常规井的通井作业、结蜡井的刮蜡、水井除垢、下放测井工具，起下电缆等功能。



Continuous steel sucker rod tripping service is operated through special designed service rig. Now we own over 10 service rigs in various types. Service rigs are fast in mobilization and trip service, resulting greatly decreased labor intensity. Truck mounted service rigs can move conveniently and perform broken rod fishing job. Flash butt welding truck can offer on-the-spot repair for broken rods and thus enhance work efficiency.

Using continuous steel sucker rod and the service truck can realize wiper trip in non-conventional well, scale removal in water well, paraffin scrape in paraffin-troubled well, landing of logging tool and lifting or down the oil well cable.