TECHNICL NOTES				
NOTES	CONTENT			
GENERAL NOTES				
Notes	 He rope pump is a relatively inexpensive solution for pumping water out of relatively deep man-made wells. Using multiple pistons connected to a rope, the pipe system sits partially underwater, while the user turns a crank above the well. As the crank turns, the rope is moved down into the well, up the pipe system, and around the crank wheel, repeating itself over and over again. As the rope passes through the partially submerged pipe system, these pistons connected to the rope draw water up the pipe system, to a spout at the surface, where the water can be used. This type of pump uses an adjustable PVC piping system to vary both the depth of the system, and the force needed to bring up water. The pipe is able to be lowered to a desirable depth, and locked in place, so that it remains rigid while in operation. The approximate length of the rope can be found by determining the entire depth of the well. Multiply the entire depth of the well by 2. Next, with the rope itself, run it through the above-ground system (ie. the pumping wheel and the bicycle wheel) and measure the length of this system. Add approximately 10 feet to the total length, since the rope will run at an angle to the vertical when ascending into the well. Once again, extra length to the rope to compensate for knots, which will be used to hold the pistons. The shaft collars are the two components responsible for both holding the adjustable pipe system in place, and allowing it to move. If the force needed to turn the crank becomes very low, and not much water is being pumped, the system can be lowered in order to pump more water. 			

PROJECT Rope Pump with	CREATED BY	APPROVED BY	DATE	VERSION
Depth adjustable	J. Zeron	A. Morillo	30/08/2021	1.0
PART NAME	FILE NAME			POS
Technical notes				C1
DEVELOPED BY	REDESIGNED BY	DOC. TYPE MATERIAL		QUANTITY
		Technical		
		LICENCE	SCALE	SHEET
Appropedia	OHO e.V.	CC-BY-SA 4.0		6 /22