



A TYPICAL INSTALLATION OF CPRS @ GNPOC

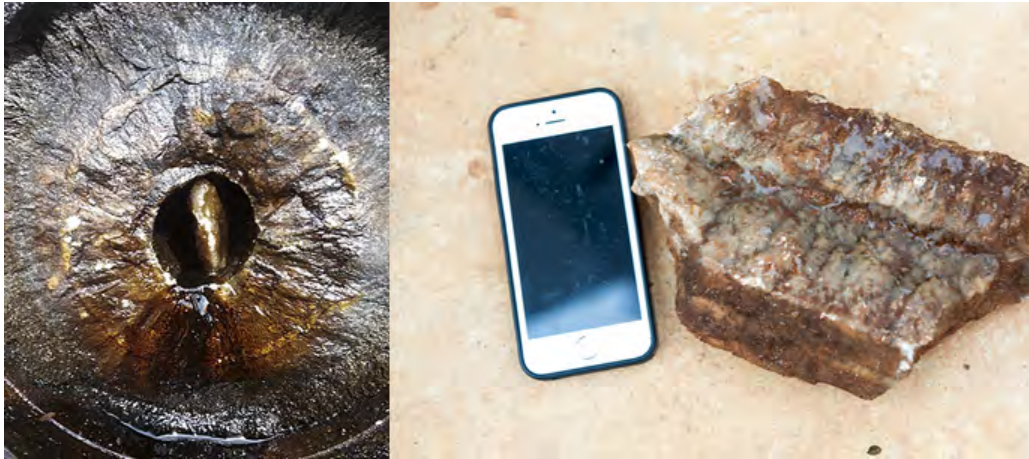
CORROSION INHIBITOR SYSTEMS

GNPOC NEEM OILFIELD

GNPOC NEEM OILFIELD IS LOCATED AT THE SOUTH BORDER OF THE REPUBLIC OF SUDAN, WHERE OIL PRODUCTION HAS BEEN HINDERED BY SERIOUS PARAFFIN AND SCALE PROBLEMS.



GNPOC NEEM OILFIELD



GNPOC IS USING CHEMICALS TO INHIBIT THE SCALE AND PARAFFIN AND USING ACIDS TO CLEAN THE FLOWLINE AND OIL WELLS. EVEN BY DOING THIS, THE SCALE STILL PLUGS OFF THE FLOWLINE AFTER 2-3 MONTHS.

CPRS TO SOLVE THE PROBLEMS



- TWO 6X8 CPRS SURFACE UNITS WERE PURCHASED TO COMBAT THE SCALE AND PARAFFIN PROBLEM
- INSTALLATION OF CPRS SURFACE UNITS WAS STARTED ON MAY 20, 2014
- SHORT MEETING AT THE WELL SITE TO DISCUSS THE INSTALLATION

SLECTION OF THE INSTALLATION POSITION



- 2-3 METERS AWAY FROM THE CHRISTMAS TREE ON THE FLOWLINE
- IN FRONT OF THE CHEMICAL ADDING POINT
- TRY TO USE CPRS SURFACE UNIT TO ELIMINATE FUTURE CHEMICAL USE AND ACID CLEANING

PREPARATION BEFORE THE INSTALLATION



- MOVE THE CRUDE OIL TRANSPORTATION TRUCK AND FIRE FIGHTING TRUCK INTO LOCATION
- LOAD THE CRUDE OIL INSIDE THE FLOWLINE AND PREPARE FOR ANY FIRE SITUATION

PREPARATION BEFORE THE INSTALLATION



- BLEED OFF ANY PRESSURED GAS INSIDE THE FLOWLINE
- DRAIN ALL CRUDE OIL INSIDE THE FLOWLINE AND LOAD IT TO THE TRANSPORTATION TRUCK

PREPARATION BEFORE THE INSTALLATION



AFTER THE INSTALLTION POISTION IS DECIDED, REMOVE THE INSULATION MATERIALS OUTSIDE OF FLOWLINE

PREPARE CPRS SURFACE UNITS



FLOWLINE CUTTING



WELDING



A WELL DONE JOB, SO EASY!



RESULTS!

GNPOC ACKNOWLEDGED THAT THE TOOL WORKED WELL AND BOUGHT 20 MORE UNITS. IT NOT ONLY PREVENTED SCALE BUILDUP BUT ALSO DISLODGED WHAT WAS THERE.

