

Use of Methane - Conversion of W.D Trucks

0 2 5 9

Unclassified E.O. 12356 Section 3.3/NND No. 785021

f W.D Trucks

10000/148/914
Jan '46

HEADQUARTERS ALLIED COMMISSION

APO 394

Transportation Sub-Commission

CWAP/fd

AC/R/58/Tn 5

30 January 1945

Meeting in Colonel Carnes' Office

SUBJECT: Methane - Conversion of W.D. Trucks for use of.

Present: 1. Colonel Carnes
 2. Colonel Eyles
 3. Lt. Col. Bordass
 4. Lt. Col. Harris
 5. Maj. Brereton
 6. Maj. Pepper
 7. Mr. West
 8. Mr. Velani
 9. Mr. Piga

The meeting was opened by Colonel Carnes for the purpose of determining the advisability of trying to make some plan to convert Government trucks to use Methane rather than gasoline in view of saving shipping and making utilization of a local product.

Colonel Carnes stated that certain difficulties presented themselves and asked the CIP representatives to state their position, and the Road Division representative to give information as to what AC's responsibility was in reference to military trucks, lifts, etc., in order that a decision could be reached as to how many, if any, trucks should be converted to use methane.

Colonel Eyles stated that before the Allies came into Italy the Italians had developed the use of the Methane gas as a natural product, so that an equivalent of 60,000 tons of gasoline could be produced. 8,000 tons used in Florence area and 52,000 tons in the north. The weight of the apparatus used restricted range of action. If vehicles were to run a radius of 60 miles, containers must be transported for use. The weight of the containers and the shortage of transport was such, that the question of the transport of full containers had not been considered. The re-introduction of this was being tried in Florence, with some success, using Italian trucks (no WD vehicles were being used) and an attempt was going to be made to do the same thing in northern Italy. If the plan to use WD vehicles was carried out it would mean a considerable volume of gasoline would be consumed and the problem

3. Lt. Col. Boddess
 4. Lt. Col. Harris
 5. Maj. Brereton
 6. Maj. Pepper
 7. Mr. West
 8. Mr. Velani
 9. Mr. Piga

The meeting was opened by Colonel Carnes, for the purpose of determining the advisability of trying to make some plan to convert Government trucks to use Methane rather than gasoline in view of saving shipping and making utilization of a local product.

Colonel Carnes stated that certain difficulties presented themselves and asked the CIP representatives to state their position, and the Road Division representative to give information as to what AC's responsibility was in reference to military trucks, lifts, etc., in order that a decision could be reached as to how many, if any, trucks should be converted to use methane.

Colonel Lyles stated that before the Allies came into Italy the Italians had developed the use of the Methane gas as a natural product, so that an equivalent of 60,000 tons of gasoline could be produced, 8,000 tons used in Florence area and 52,000 tons in the north. The weight of the apparatus used restricted range of action. If vehicles were to run a radius of 60 miles, containers must be transported for use. The weight of the containers and the shortage of transport was such, that the question of the transport of full containers had not been considered. The re-introduction of this was being tried in Florence, with some success, using Italian trucks (no WD vehicles were being used) and an attempt was going to be made to do the same thing in northern Italy. If the plan to use WD vehicles was carried out it would mean a considerable volume of gasoline would be consumed and the problem presented itself as to whether it would be worthwhile or possible to make advance preparations for collecting the conversion apparatus for use in the Allied Commission trucks.

Seen [Signature] 10/2/41

3070

The question was raised as to whether or not the conversion material was available; it was brought out that there was no accurate knowledge of the number of vehicles which had been converted before, but that a large number of vehicles had been converted from which the containers had been removed so that they could run on gasoline.

Colonel Carnes stated that it might be possible to get pins, gauges, lines, but that AC did not have the carburetors which would be required for Methane. In answer to Colonel Tyles' question of whether or not 3-ton trucks could be converted to use Methane, it was stated that the mixture was to be adapted to the carburetor. It was pointed out that a special carburetor was not necessary; that it could be introduced into a normal carburetor and have double carburation for use either with methane or gasoline. Colonel Carnes asked whether we could use standard equipment, and was told that additional equipment would be necessary, and that it might be possible to get a certain amount of it.

Mr. West stated that since it was more convenient to use gas than methane, where they had double carburation, the operator would use gasoline.

Colonel Carnes asked whether or not the number of W.D. trucks that would have to be modified would warrant such necessary modification i.e. was it not possible that a number of civilian trucks might be found already so equipped sufficient to consume all the Methane available.

Mr. West stated that there was available in well heads in the Po Valley more methane than could be consumed by the number of vehicles that were likely to be found there.

He also stated that there was 16,000 cubic meters of methane in Florence for vehicles' use at present, and it could not be envisaged how half of it could be used in the next two or three months.

Colonel Tyles stated this was partly due to Italian opposition to the use of methane, since there was no black market in this commodity as in the case of gasoline.

Colonel Carnes suggested that it might be possible, as an experiment, to convert some of the W.D. trucks now being employed in the Florence area, but it was pointed out that such trucks were employed on comparatively long distance hauls, rendering the use of methane impracticable owing to the amount

question of whether or not 3-ton trucks could be converted to use Methane, it was stated that the mixture was to be adapted to the carburetor. It was pointed out that a special carburetor was not necessary; that it could be introduced into a normal carburetor and have double carburation for use either with methane or gasoline. Colonel Carnes asked whether we could use standard equipment, and was told that additional equipment would be necessary, and that it might be possible to get a certain amount of it.

Mr. West stated that since it was more convenient to use gas than methane, where they had double carburation, the operator would use gasoline.

Colonel Carnes asked whether or not the number of W.D. trucks that would have to be modified would warrant such necessary modification i.e. was it not possible that a number of civilian trucks might be found already so equipped sufficient to consume all the Methane available.

Mr. West stated that there was available in well heads in the Po Valley more methane than could be consumed by the number of vehicles that were likely to be found there.

He also stated that there was 16,000 cubic meters of methane in Florence for vehicles' use at present, and it could not be envisaged how half of it could be used in the next two or three months.

Colonel Lyles stated this was partly due to Italian opposition to the use of methane, since there was no black market in this commodity as in the case of gasoline.

Colonel Carnes suggested that it might be possible, as an experiment, to convert some of the W.D. trucks now being employed in the Florence area, but it was pointed out that such trucks were employed on comparatively long distance hauls, rendering the use of methane impracticable owing to the amount of containers that would have to be carried in view of the fact that no compressing stations were available on the routes used.

Colonel Lyles stated that the Petrol Section had asked AMG to supply the names of all owners whose vehicles had at any time been converted to the use of methane, in order that the conversion equipment could be collected.

Colonel Carnes asked whether, in the event of it being possible to collect the equipment, it would be practicable to use same on civilian vehicles in the Rome area.

Colonel Eyles replied that such procedure would be impossible in view of the fact that Methane would have to be transported from the Florence area to Rome (due to lack of any pipe line) which would not be practicable procedure owing to the enormous weight of the containers.

It was then pointed out that one of the main hauls would be along the route Forlì, Bologna, Parma, Milan, and that it was known that a pipe line existed in that vicinity and that an adequate number of compressing stations had been established. Provided that these could still be utilized, Methane could be used, at any rate on that route, with advantage. It was then decided that A.C. would furnish CIP with a truck which would be converted for the use of Methane. This truck would operate in the Florence area for the purpose of determining the effect, if any, of the use of Methane on the vehicle; it would also permit CIP to determine the equipment necessary for modifications. It was agreed that CIP would collect and prepare all equipment necessary to modify W.D. trucks, and upon arrival in the area they would turn this equipment over, with plans for modification, to the Truck Battalion so that these modifications could be made quickly.

It was further agreed that all trucks modified would operate on either Methane or Gasoline.

Chapman, May
Major R.A.S.C.
Admin. Officer
Roads Section

0 2 6 5