

Good evening coming to the last abstract in the current session.
So now I will discuss the role of local radiation therapy in a different set of patients who are the EGFR mutated patients.
So this was published in the thoracic oncology.
So for mutation positive patients the standard of care.
The first generation TK has shown a median PFS of around 9 to 13 months while the third generation neurotic TK has shown a medium PFS of 11 to 18 months.
The local intrathoracic progression still remains a challenge.
Approximately around two-third of patients will have a local intrathoracic progression.
The role of local consolidation RT in this setting remains controversial and still there is no clear guidelines whether to add a local therapy or not.
So aim of this multisenteric randomized phase 3 trial was to evaluate the efficacy and the safety of EGFR TK with concurrent thoracic RT for patients of EGFR mutation oligo organ metastatic NACLC.
So in this trial they had pre-planned inter-linearities which were yearly inter-linearities for four-year plant.
After first two analysis the AccroR was stopped due to significant results and the final analysis was presented with the fall of till February 2023.
So they included the histologically proven NACLC with age of 18 to 80 years E-COX score of 0 to 1.
EGFR 19 deletion or L8-5-8 R mutation positive.
No synchronous metastatic organs should be 1 to 3.
A number of two cycles of chemotherapy were permitted prior to the randomization and life expectancy defined by the physician was more than 3 months.
So they used the first generation TKI-E14 if 125 milligram per overall thrice a day.
The thoracic RT was planned to start within 14 days of starting the TKI.
They had planned a conventional fractionated RT 60 green 30 fraction over a period of 6 weeks with either a 3D CRT or IMRT as per physician choice.
They had used the standard lowest constraint for the lung esophagus in the heart.
They included the primary lung tumor and the involved nodal area for radiation station.
The radiation to the metastatic site was as for the physician's choice.
The primary endpoint of the trial was PFS.
The secondary endpoints were OS and the adverse reactions.
They had an exploratory endpoints like the local regional PFS and the distant metastasis PFS.
So one is to one randomized the plant approach was 342 patients.
So between April 2016 and March 22, they had randomized 118 patients between the TKI and the TRTM.
So they had done both intention to treat analysis as far as the protocol analysis also.
These are the baseline characteristics.
So it was equally matched between the two arms.
Almost 50% of the patient had the brain metastasis also.
And the radiation to the metastatic site was given in around 45% of the patient in both the arms.
Coming to the adverse events.

So grade 3 or 4 adverse events were more in the thoracic radiation arm.

11.9% versus 5.9%.

The ECB-H-ITs were commonest or 6.8% followed by the pneumonitis 5.1%.

The patient in the TKI group also had an esophagitis or pneumonitis because of the treatment to the

metastatic site as for the physician's choice.

So at the median follow-up of 27 months, in the intention to treat analysis, the PFS

and the OS was significantly better in the thoracic radiation arm.

Similar results were seen in the per-protocol analysis also.

Coming to the patterns of the first failure.

In the TKI-M, the loco-regional relapse was the common.

Seen in around 33% versus 13% in the thoracic arm.

The decision metastasis was seen in 37% of the patient in the TKI-M versus 50% in the thoracic arm.

Thoracic radiation arm also had a better loco-regional free PFS, but similar distal metastasis in the brain metastasis PFS.

So the authors concluded that the survival of benefits seen with thoracic arm was mainly

attributed to the better local control in the intercraniothoracic primary as well as the nodal

control. In the exploratory to subgroup analysis, the thoracic RT-M had more benefit in the female

patients, older patients and the patients who didn't receive any induction chemotherapy.

The hazard ratio for the PFS was similar in the different metastatic organ groups.

One versus two versus three as well as the metastatic site groups also.

So coming to the last side, the strength of present analysis is they had a uniform artificial protocols with a stringent loss constraints. It represents the population

in the general populations also. The brain metastasis patients were included, patients were included in the trials. The limitation is they use the first generation TKI as the

standard arm. The small number of patients because of the early completion of the trial

and they use the protracted fractionation like a 30 fractions for a 6 week treatment.