surface, the importance of our forests is outgrowing the traditional economic frames of reference and taking on the dimensions of a key component of the biosphere, exerting as it does a stabilizing influence on natural conditions throughout the entire northern hemisphere. On the correct exploitation of the forests depends the solution of such important problems as raising the productivity of the biosphere, the intelligent use of land and water resources, achieving high crop yields in agriculture, and providing favourable conditions for human habitation.

Implementation of the tasks confronting forestry necessitates having access to a vast, all encompassing and constantly self-renewing body of information on the total forest area (lesfond). It is on the basis of this information that optimal solutions relative to the multipurpose use of forest resources ought to be worked out and adopted. Currently, however, the supply of information on the state of the total forest area is far from adequate, especially in the taiga regions. In almost half of the territories the total forest area has been inadequately studied. There is an almost total lack of small-scale special purpose maps. Today, the traditional equipment and methods no longer provide for rapid surveillance of the state of the forests, the dynamics of the total forest area, and logging activities. For problem solving, new scientific and technical data bases, founded on the latest methods of remote sensing, are needed. It was in order to solve this important national economic problem that beginning in the early seventies a multidisciplinary, special purpose programme of scientific research to develop methods of remote sensing of the forests was instituted in the USSR. Forest use and nature conservation problems have been the main areas of concentration.