

# 10 WEST



The hotspot position for broadcasting in Central and Eastern Europe



telenor

# Capturing digital growth

## » Prime location

Telenor Satellite Broadcasting (TSBc) prides itself on being at the cutting edge of innovation in European satellite broadcasting. We provide high quality satellite capacity and broadcast services from a prime orbital location, 1° West, which has established itself amongst the positions in the region, specifically Central and Eastern Europe.

## » Why satellite works

Satellite offers instant spectrum and unrivaled potential for broadcasters to launch portfolios of channels. Its ubiquity of coverage for Direct-to-Home (DTH) and Cable services as well its 100% reach in chosen markets, provides quality, scalability and minimal costs, creating the perfect solution for TV and radio transmissions.

In addition, satellite has become the platform of choice for high definition television (HDTV), where quality of service is evermore critical.



# Optimised coverage for DTH platforms

## » Tailored solutions

Transmitting content via our satellite fleet based at 1° West, Telenor Satellite Broadcasting provides secure, flexible and reliable distribution of Direct-to-Home (DTH), audio and High Definition (HD) TV services by creating a tailored solution to address your needs. Our comprehensive services portfolio covers the entire distribution process from encoding, multiplexing, uplinking satellite capacity, monitoring during transmission as well as contribution services via our video terrestrial fibre network.

Our unique orbital location covers a third of the world's land mass and already reaches nearly 2 million DTH homes in Central and Eastern Europe and over 3 million

DTH households in the Nordic region, where the majority of the DTH satellite dishes and 100% of the cable head end antennae, point to 1° West.

Telenor Satellite Broadcasting's advanced infrastructure is based on our own satellite fleet, including the partly owned Intelsat 10-02 satellite, uplink facilities and our ground based network across Europe.

# The no. 1° spot for Broadcasters

## » A complete solution

Telenor Satellite Broadcasting delivers more than 200 digital TV channels on 1° West. This expertise, combined with our expansive ground infrastructure – including teleports and a terrestrial video fibre network spanning across Europe and interconnecting to the US – offers broadcasters a complete turnkey solution for channel distribution and contribution via satellite and fibre links.

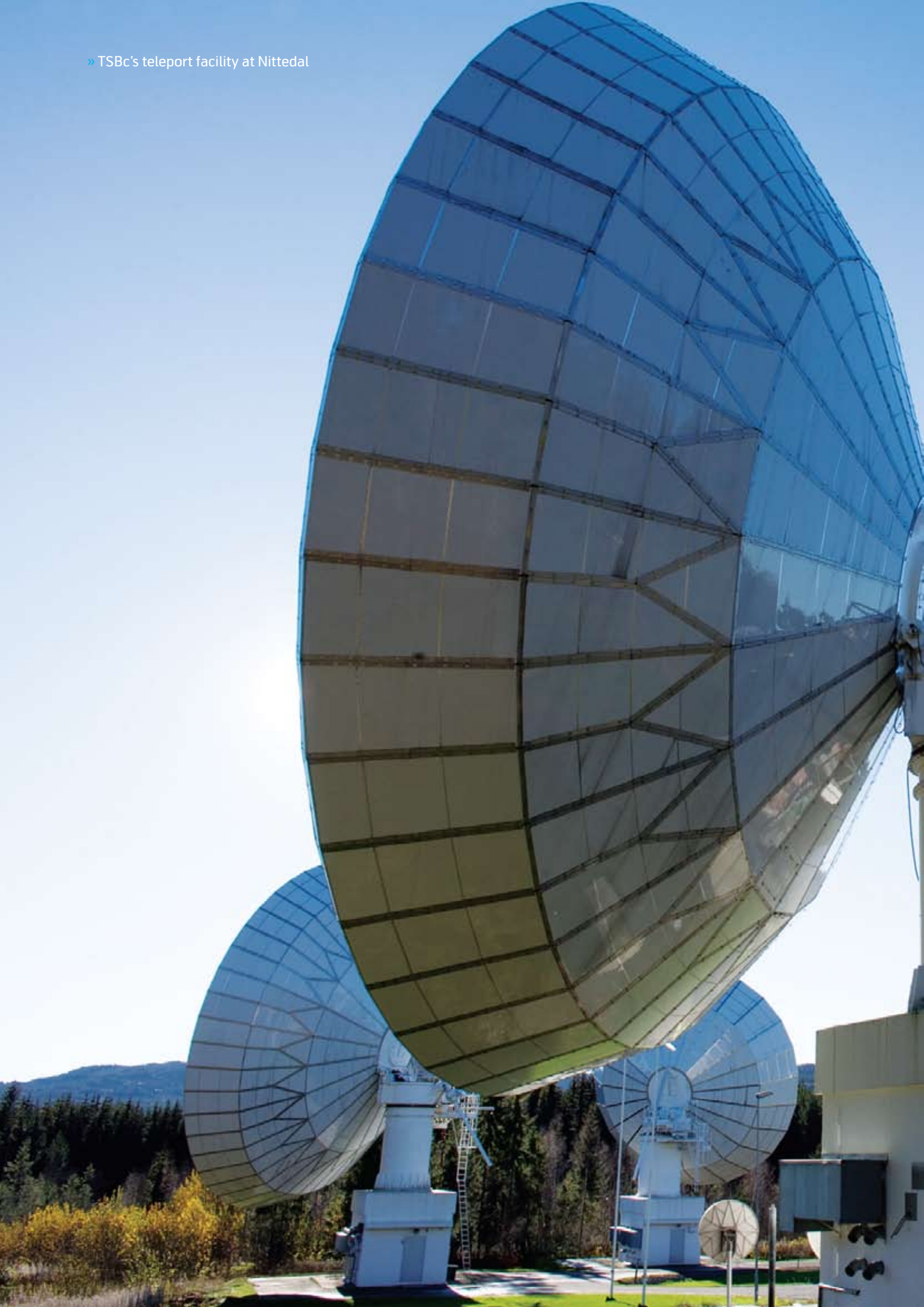
From transmitting content via one of our satellites, to point-to-point distribution services via our terrestrial fibre network, TSBC is the choice provider for broadcast services.

## » Established position from 1° West

With our existing base in Sofia, Bulgaria, as well as excellent DTH coverage for Central and Eastern Europe from 1° West, Telenor Satellite Broadcasting is ideally positioned to serve your broadcast needs. We combine our broad reach satellite capacity with end-to-end broadcast services, adapting our solutions to address your chosen markets.

1° West already serves nearly 15 million homes comprising of approx 4.5m DTH households and reaching 10 million via cable head end networks\*

\*Source: Q4, 2007, comprising of Canal Digital published results, Dataxis (26/03/2008) and TSBC's satellite monitors



# Our 1° West fleet

Our satellite fleet offers attractive coverage for broadcasting and data services throughout the Nordic region, Europe and the Middle East.



Thor III  
Spot 1



Intelsat 10-02  
Spot 1



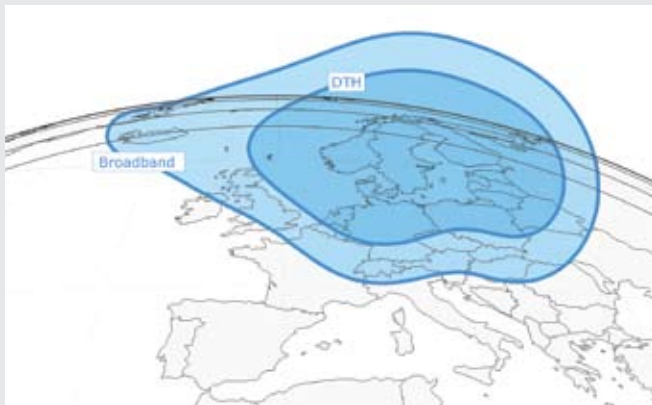
Intelsat 10-02  
Spot 2



THOR 5  
T1

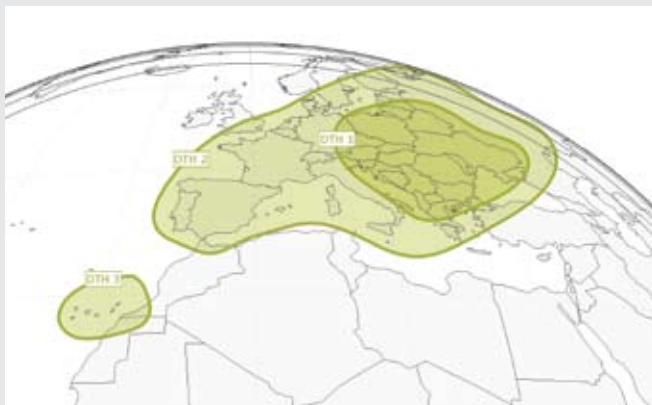


THOR 5  
T2 and T3



THOR 6  
K1

Planned launch Q4, 2009



THOR 6  
K2

Planned launch Q4, 2009

# Delivering today

## » [Support from the ground](#)

Telenor Satellite Broadcasting's investment in uplink facilities and associated infrastructure means that we are well equipped to offer our customers top ground-based satellite services from our various teleport locations.

Telenor Satellite Broadcasting has three main teleport locations and operates antennas from 4 other European locations. Nittedal Teleport, near Oslo, Norway is our largest site, offering over 30 uplink systems which can operate satellites in the viewable arc from 45°W to 66°E (1/3 of all satellites). We also have our Central London Teleport located in Russell Square and our Bulgarian teleport located in Sofia.

Telenor's teleport facilities offer a broad portfolio of services that range from simple uplink facilities to full turnkey solutions.





# Flexible terrestrial distribution

## » Multi Service Network

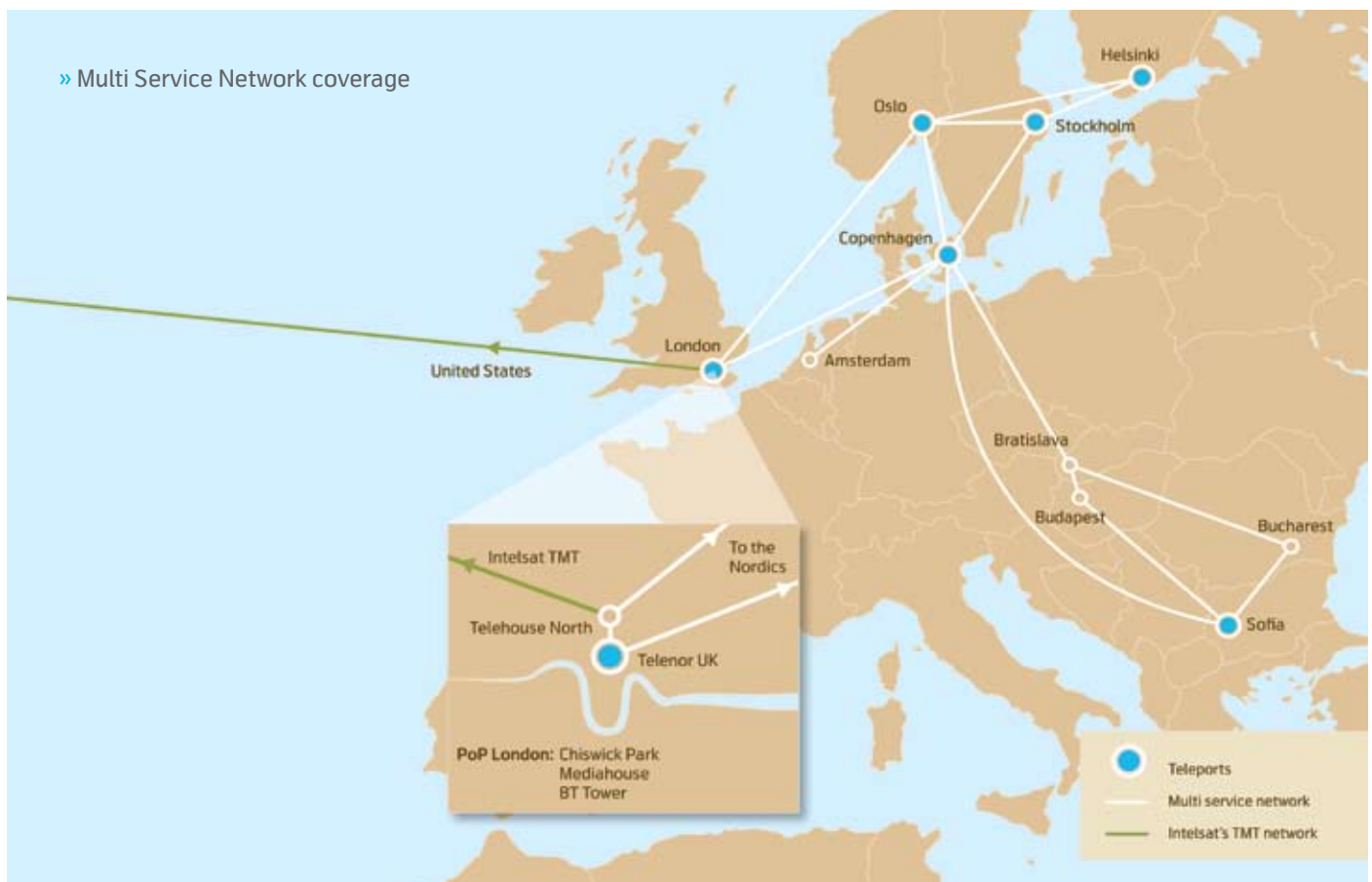
TSBc's own Multi Service Network (MSNW), is a core video terrestrial fibre link that is interconnected to all our major satellite uplink stations in Europe and is designed to provide enhanced scalability, redundancy and flexibility for the delivery of media services including TV, radio and data.

It allows customers to interconnect to the MSNW at a location of their choice for distribution of services over the 1° West platform. Customers can also interconnect

through the MSNW with other providers. All content is protected, as it travels through individual virtual tunnels.

The MSNW also provides possibilities for restoration of services through our teleports that are connected to the network, which boosts the already excellent reliability of TSBc's 1° West platform even further.

## » Multi Service Network coverage



# Looking to the future

## » Replacement and expansion

Telenor Satellite Broadcasting's replacement programme strives to continually enhance our satellite services portfolio, providing customers with greater reliability and a commitment to enable future growth.

THOR 6 is planning to launch in Q4, 2009 and will replace our current Thor III satellite. It will effectively double 1° West capability to 71 transponders, facilitating organic growth and further DTH capability, predominantly into Central and Eastern Europe.

## » TSBc's teleport facility at Nittedal



# About us

## » [Telenor Satellite Broadcasting](#)

Telenor Satellite Broadcasting (TSBc) provides extensive television broadcasting services for distribution and contribution applications to broadcasters throughout Europe, utilising a hybrid network, comprising terrestrial circuits, teleports and the satellite fleet. TSBc operates at the prime orbital location, 1° West, the leading position in the Nordic region and a hotspot position in Central and Eastern Europe. TSBc also deliver end user connectivity and application services via satellite in Europe and the Middle East.





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