

Tornado in the South-Moravian Region in the Czech Republic

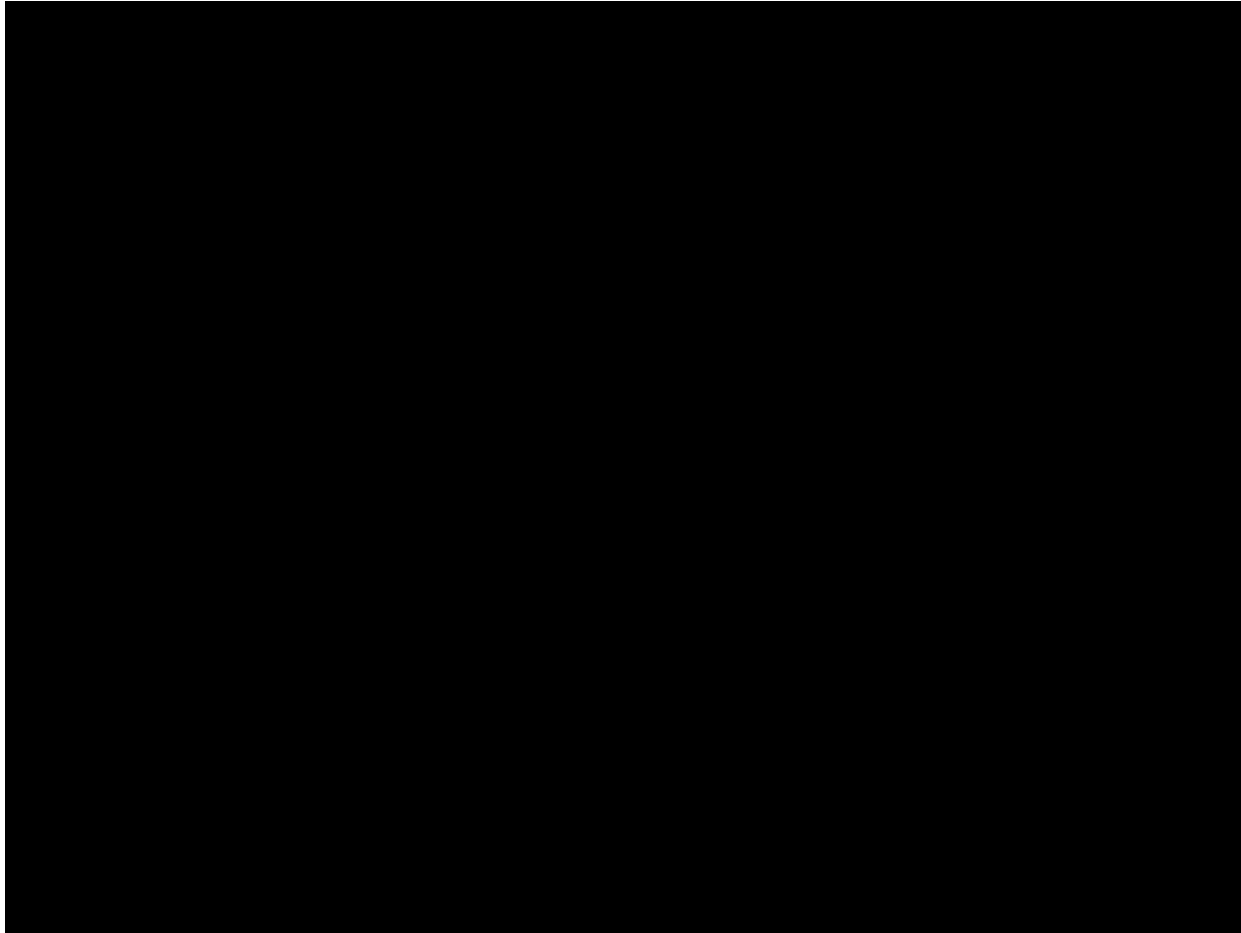
24th June 2021 19:10

Tornado struck in the Czech Republic

Tornado intensity reached F4 level of the EF-Scale (260 - 320 km/h)

The firefighters helped in the affected area for 29 days

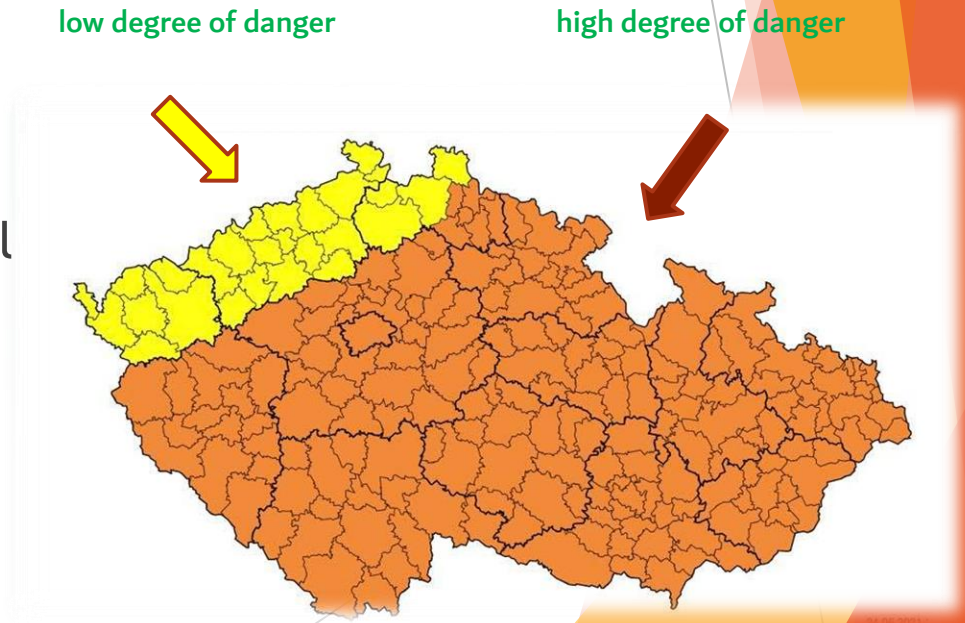
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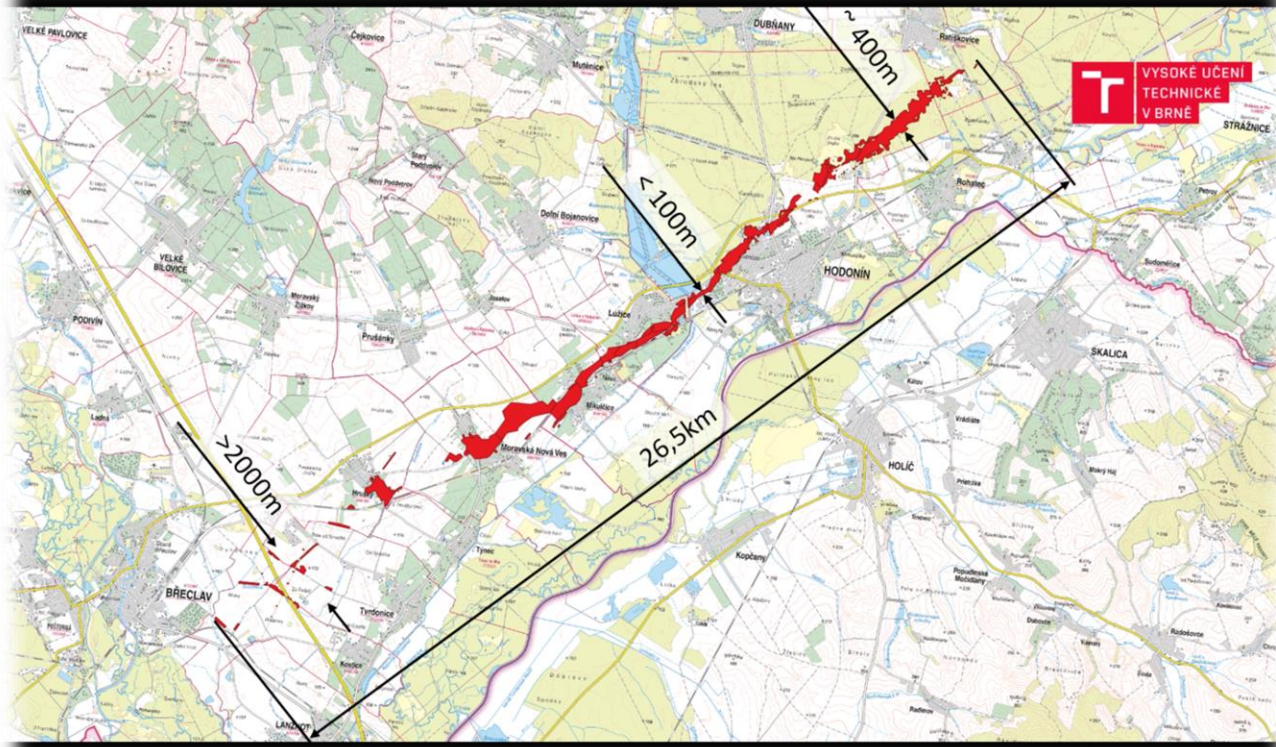
Weather forecast - strong wind up to 90 km/h
- very strong thunderstorms
- torrential rain and hail

- 20 minutes after the tornado struck, the weather forecast was still inaccurate
- The Czech Hydrometeorological Institute did not report the tornado occurrence at that time



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The affected area



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Consequences:

- 6 fatalities
- more than 200 injured people
- damaged and collapsed buildings
- damaged railways, roads, vegetation
- non-functional mobile network, electricity and gas

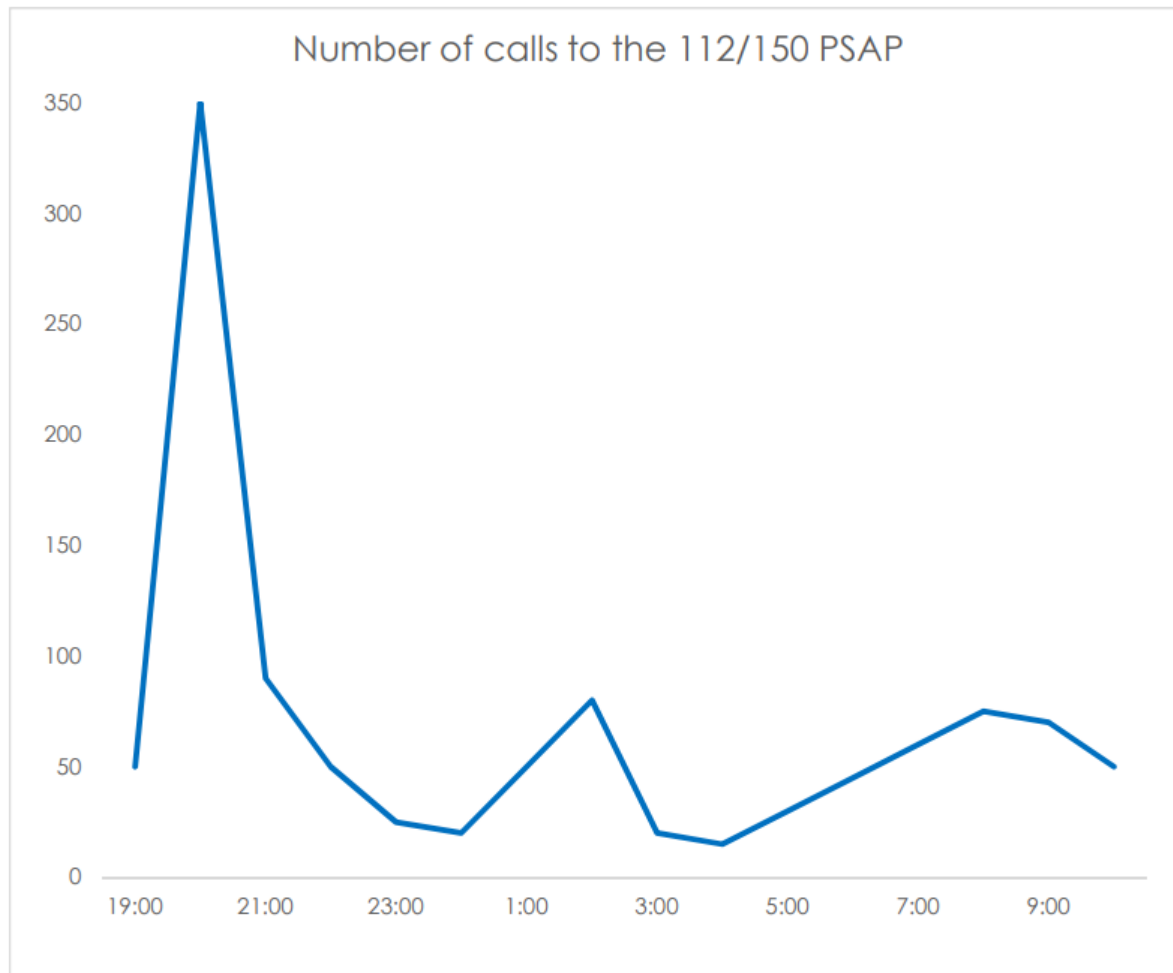


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Emergency Call Centre (ECC) main activities:

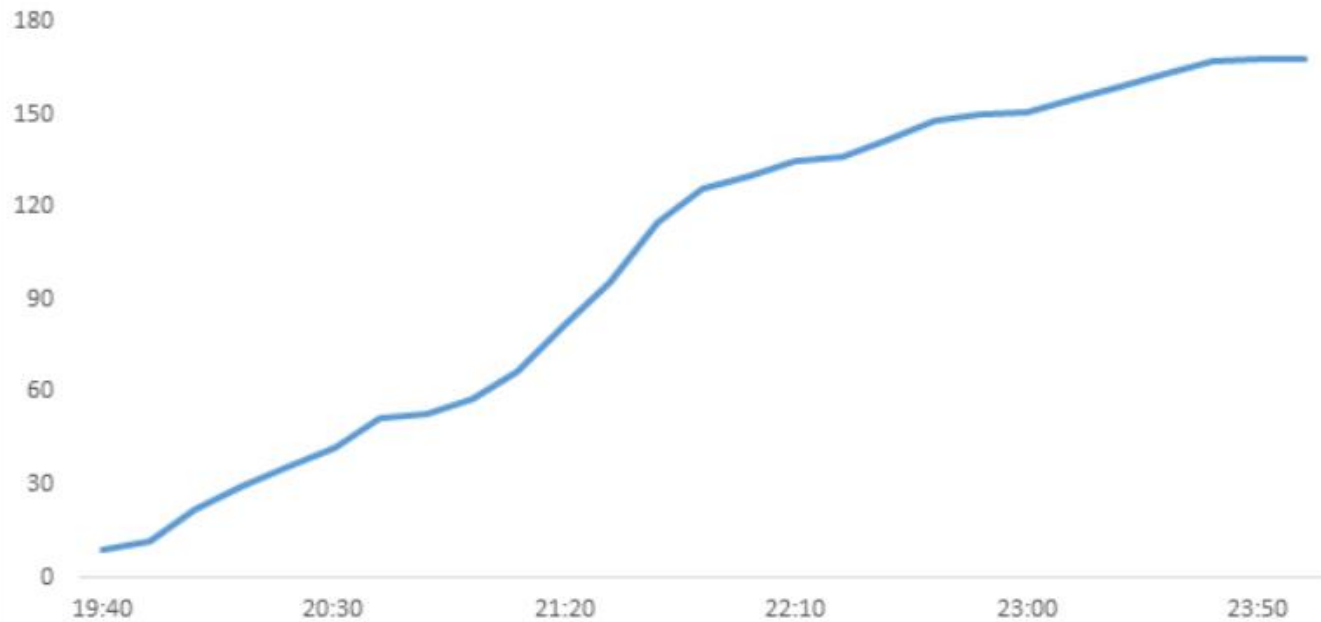
- 19:19 (T 0´) - first emergency call
- 19:36 (T +17´) - calling the morning shift back to ECC due to the high increase in calls
- 20:00 (T +41´) - 354 emergency calls, first detailed information from the affected area, convening the Crisis Management of municipalities with extended competence
- 20:33 (T +74´) - first complete information from the area

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Dispatched and intervening firefighting units on 24.6.2021 from 19:40 to 24:00 including firefighting units on on-call.



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ECC main activities:

- Crisis Management of the South-Moravian Fire Brigade arrived at ECC
- Crisis Management divided the affected area into several sectors according to municipalities
- 20:53 (T +94´) - 551 emergency calls, information from one of the incident commanders - “It’s the APOCALYPSE”

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ECC main activities:

- calling in other forces and resources from other regions, USAR team, Special Rescue Unit of FRS, Mobile Operations Centre, structural engineers, more officers and members of the headquarters to ECC and to the affected area
- cooperation with mayors and municipal authorities
- dividing radio transmission into sectors



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ECC main activities:

- 21:30 (T +131´) - request to dispatch the Army of the Czech Republic, NGOs of the South-Moravian Region
- 22:05 (T +166´) - meeting of the South-Moravian Region Crisis Management
- 22:30 (T +191´) - General Director of the FRS arrived at ECC and participated in Crisis Management meeting
- 23:30 (T +251´) - strengthening of the mobile operators signal
- 00:00 (T +281´) - declaration of a state of emergency in the affected area

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ECC main activities:

- shifts were scheduled for the next 3 days - (the number of officers was increased)
- additional structural engineers were called in from all over the Czech Republic

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The next day:

- aerial photography taken by a drone (GINA) and by an unmanned aircraft (Brno University of Technology) of the affected area
- calling in special teams from all over the country
- providing a sleeper train for volunteers (300 seats)

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Activities in the affected area:

- searching for people
- rescuing trapped persons
- road clearance
- traffic accidents
- gas leaks and fires
- buildings stabilisation
- roofs tarping
- debris removal to the disposal site
- demolition of unstable buildings
- system of calling and rotation of volunteer firefighters
- providing psychological assistance



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Tornado in numbers:

- 7541 firefighters
- 2963 fire engines
- 556 fire teams
- 230 soldiers
- Damage over € 280 million



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Negatives:

- duplicating information protocols
- wrong incident classification from other regions
- connecting calls to our ECC
- insufficient number of workplaces at our ECC
- overloaded radio transmission
- difficult orientation in the area = incomplete information
- minimal communication due to lack of staff, most staff was busy dealing with a huge number of incidents
- unannounced volunteer firefighters

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Positives:

- calling all available officers to our ECC
- functional radio network
- dividing the radio transmission into sectors
- closing a part of the highway only for incoming emergency services
- Mobile Operations Centre in the area

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Preparation for the unexpected:

- focus on training
- systematic training of selected staff with Mobile Operations Centre
- implementation of virtual reality
- experience sharing among staff
- assessment of all possible risks

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THANK YOU!