DOUBLE CAVE MAPS OF TURKEY

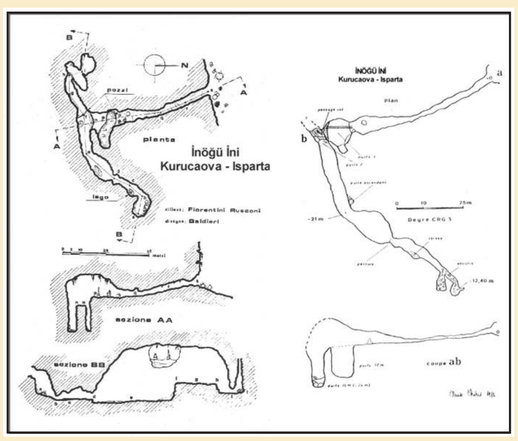
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There can be several reasonable causes for mapping a cave for a second time: Either there are new galleries that are explored and the announcement of those explorations are made with a new map, or the former map of a cave is so erroneous that it became essential to make a new survey. On the other hand, there can be a less reasonable, even a tragicomic third reason for mapping a cave for a second time: Exploring the same cave without being aware of the fact that it was actually explored and mapped before and, on the top of it, mapping it again!

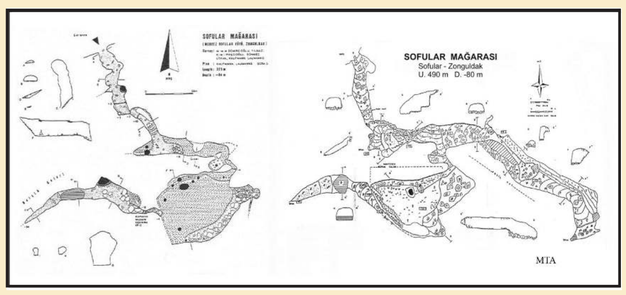
In Turkey, many double cave maps are drawn in years for all three causes mentioned above. In this poster session, although the double maps drawn for the first two causes such as Yarimburgaz or Dongel are presented, the main weight is given to the different maps of the same caves that are drawn non-contemporarily and without being aware of each other for many years. It is an interesting fact that; of all the caves, Tinaztepe and Golcuk are re-explored and re-mapped not just twice, but for four times.

While the important mistakes in those maps are probed, by the thought of the essential reason of the different maps of the same caves are drawn is the fact that it is not known if the cave is explored before, the usage of a general cave inventory and in this specific case, TAY Cave Inventory of Turkey which is published in both printed and online (www.tayproject.org), is strongly recommended.

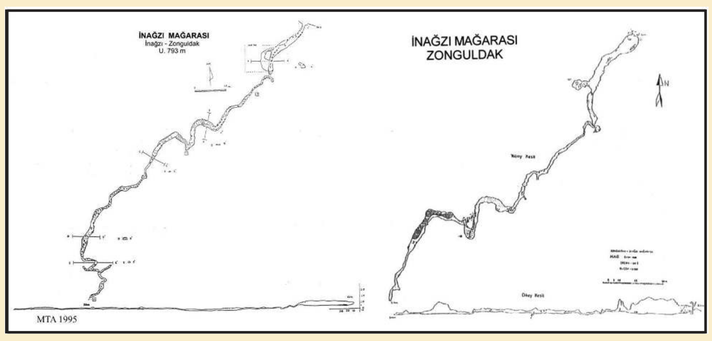




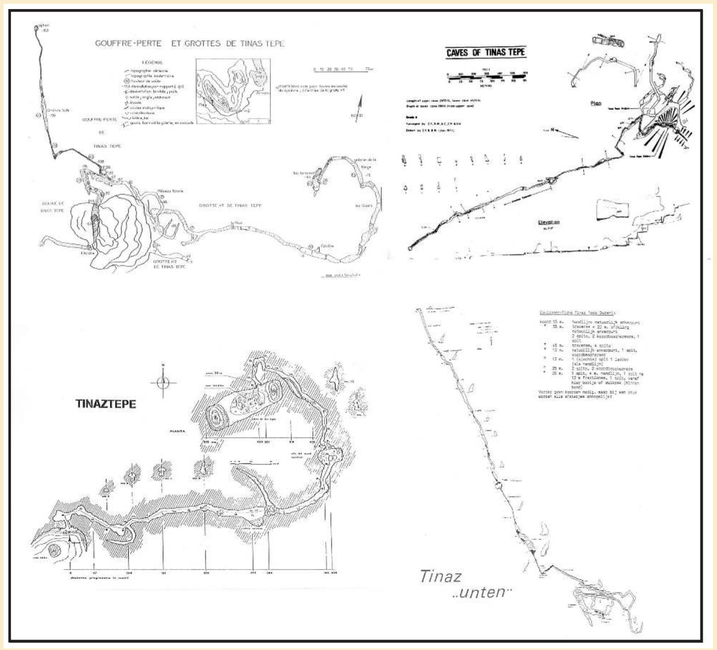
Inogu Cave: Those 2 maps, which were drawn by Claude Chabert and Fiorentini Rusconi within 5 years apart, seems more or less same except the west gallery which was not explored by the French. Though there are slight differences between the profiles, compared with our other double map examples, that difference is nothing.



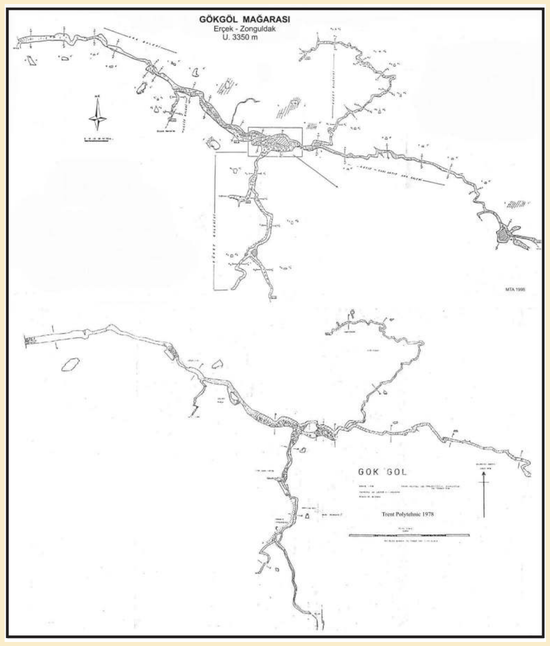
Those are Sofular Cave maps of MAD (Cave Research Association) and MTA (General Directorate of Mineral Research and Exploration). MAD team, working together with Kaufmann and Laumanns, published this map at 1990. MTA survey, dated 1995, is 170 m's longer and had a huge eastern gallery, which is completely missed by MAD. Just like the other samples, those cave maps, which become longer as the years passed, creates suspicions about the survey quality and precision.



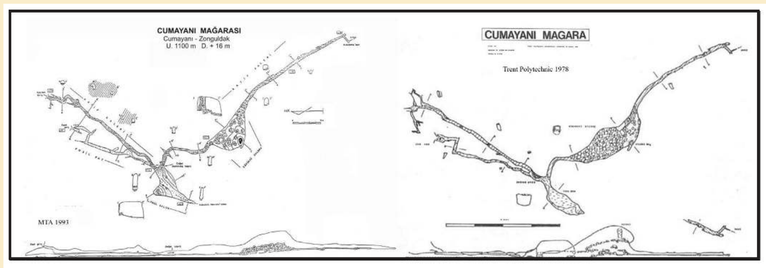
Ýnagzi Cave; left MTA (General Directorate of Mineral Research and Exploration), right MAD (Cave Research Association) maps. Everything; the branches and the directional changes of the main gallery is different. Even the open profiles are not same.



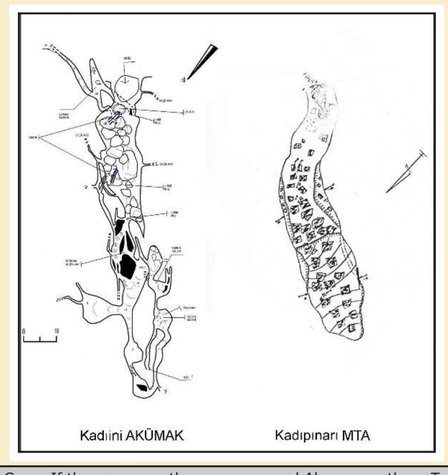
Týnaztepe Cave: A very strange example; French, English, Spanish and German maps of that difficult cave system which has a depth of -153 m and a length of 1650 m. You may feel pity for the useless efforts of all those cavers. On the other hand, those maps are so different from each other that, after all those maps we still don't know which one is correct.



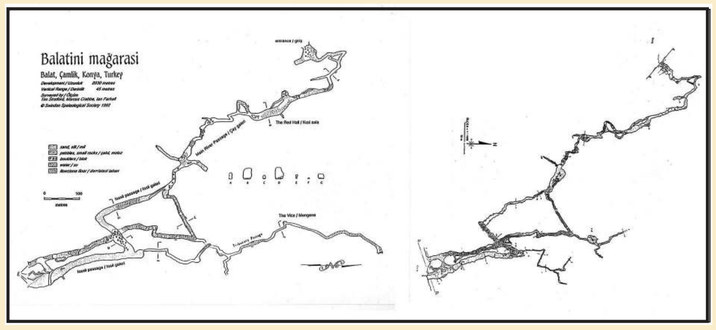
Gokgol Cave; up MTA (General Directorate of Mineral Research and Exploration) and below Trent Polytehnic maps. Apart from the south and southeastern galleries, nearly similar maps.



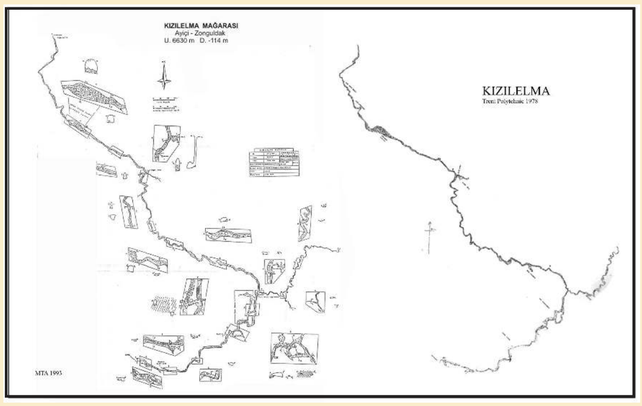
CumayanýCave; left MTA (General Directorate of Mineral Research and Exploration), right Trent Polytechic maps. Apart from the differences in two main chambers, more or less they look alike.



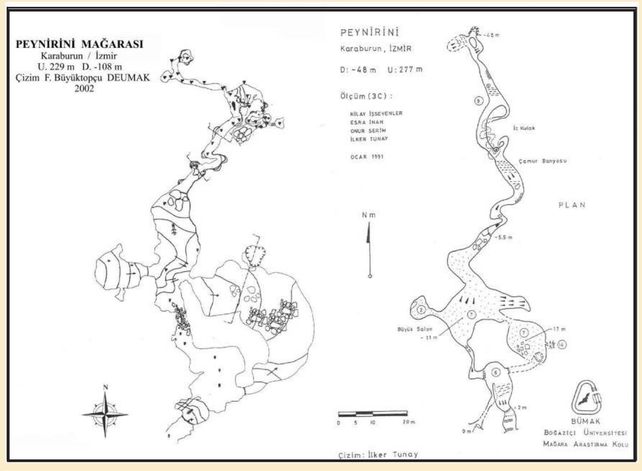
Kadipinari or Kadiini Cave: If there are no other caves around Alanya, southern Turkey, with a name begining with "Kadi", those two maps must belong to the same cave. 20 years after being explored, surveyed and named as "Kadipinari Cave" by MTA (General Directorate of Mineral Research and Exploration), AKUMAK (Akdeniz Univ. Caving Club) visited and measured the cave again at 2009. In their map, the cave is named as "Kadiini Cave". The cavers of AKUMAK found a small entrance on the west wall of the main chamber and pushed the length of that cave from 110 m's to 1,500 m's. But, in this picture, you only see the maps of main chamber. Even in that main chamber of the cave, the differences are so huge that, we still are not sure if they're the same caves.



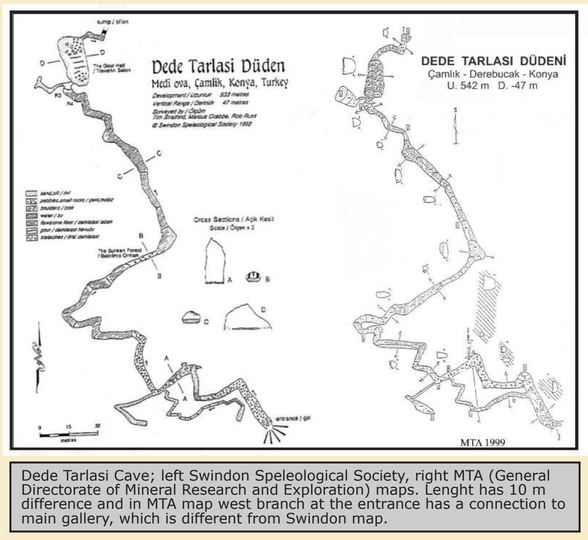
Balatini Cave: Left; Swindon Speleological Society's map dated 1992 and on the right handside MAD's (Cave Research Association) map dated 1982. In order to make both maps within the same direction, MAD's map had been turned to same direction to Swindon's. Both maps are more or less same within the first glance but, the second gallery towards north in Swindon's map is much shorter in MAD's map. Presumeably, 10 years before Swindon cavers, MAD cavers were too tired to continue on that gallery!



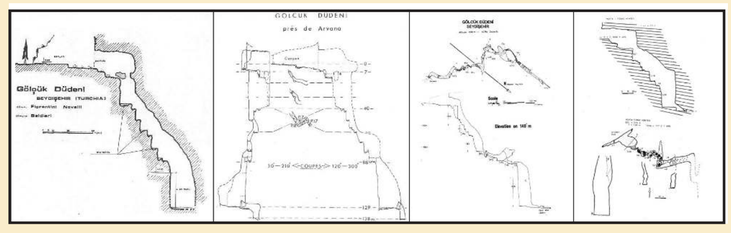
Kýzýelma Cave: Left MTA (General Directorate of Mineral Research and Exploration), right Trent Polytehnic maps. Two wonderful survey examples for a cave which is longer than 6600 m's and, apart from the east branch, nearly similar two maps of the cave.



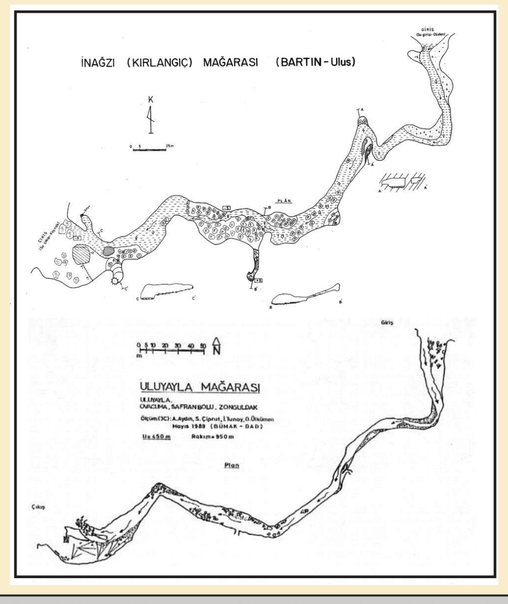
Peynirini Cave: Left DEUMAK (Dokuz Eylul Univ. Caving Club), right BUMAK (Bogazici University Caving Club) maps. Apart from everything else, there's a %20 difference in lenght and nearly %50 difference in depth. Nearly nothing look alike in those two maps. Possibly during the passed 11 years cave must changed a lot!



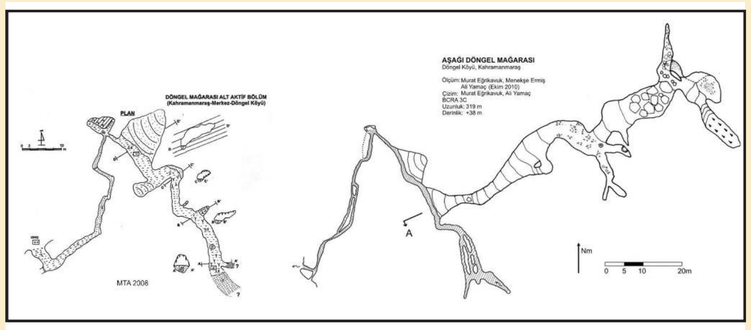
Dede Tarlasi Cave; left Swindon Speleological Society, right MTA (General Directorate of Mineral Research and Exploration) maps. Lenght has 10 m difference and in MTA map west branch at the entrance has a connection to main gallery, which is different from Swindon map.



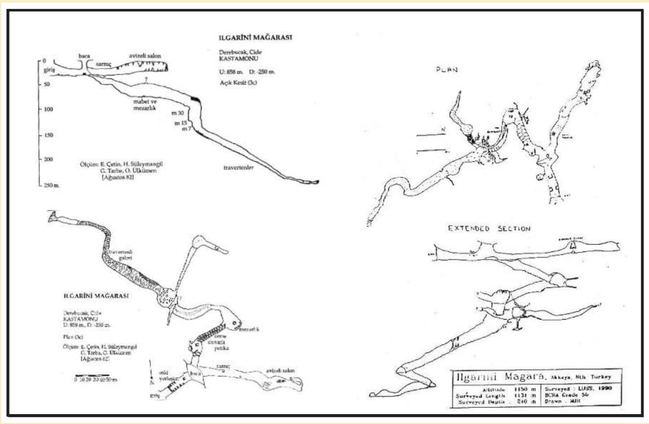
Golcuk Sinkhole: One of the best examples of Turkish caving and cave mapping history. From left to right Italian, French, English and German maps of the same cave. Every team which passed from that 'easy to reach' karstic region re-explored Golcuk Sinkhole and draw a new map. Even the depths of the cave is different.



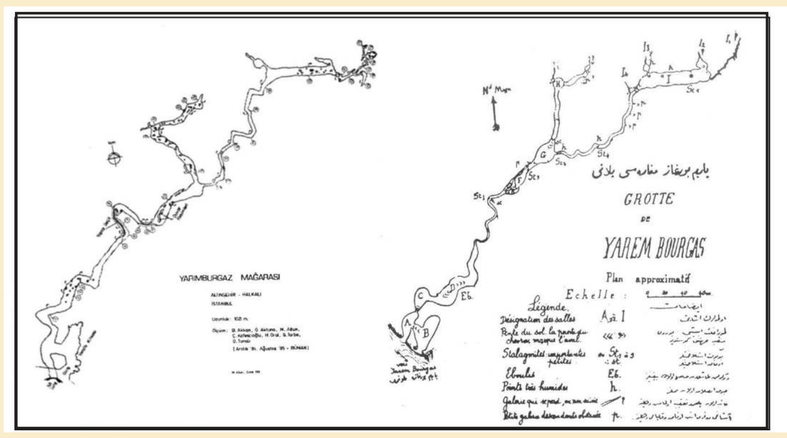
Uluyayla Cave: Top MTA (General Directorate of Mineral Research and Exploration) and below BUMAK (Bogazici Univ. Caving Club) maps. That travers cave, which was surveyed in 1989 by BUMAK was re-surveyed at 2002 by MTA with a different name. Two side branches which were very clear in MTA map; one near to exit and the other one in the middle of the cave, at the south wall were completely missed in BUMAK map. If the faults were limited with those two branches we could call them "missed", but the angle of diversion of the cave after 100 m's from the entrance and the width was so different that, within such a short and comperatively 'easy to survey' cave, those differences are unbelievable.



Another example of careless survey. Though other parts of that cave, which is in Kahramanmaras - Turkey, are more or less same in both maps, its obvious that during the MTA (General Directorate of Mineral Research and Exploration) survey of 2008, they completely missed a small opening which leads to a gallery longer and larger than the main gallery as shown on the right map of OBRUK Cave Research Group, which had explored and mapped the cave only 2 years after MTA.



Ilgarini Cave: Within the first glance they look like each other. If they look like each other, then its really difficult to explain the 10 m's depth and 273 m's length difference between the BUMAK (Bogazici Univ. Caving Club) and LUSS (Leicester Univ. Speleological Society) maps which were drawn 8 years apart. If you look carefully you may realize that they are not very similar. Take a closer look to LUSS's profile: There is another descent and 3 question marks after that descend, which do not exists in BUMAK map. On the other hand, what can be said to this sketch quality map of LUSS with a 'BCRA 5B' standard?



Yarimburgaz Cave: On the left side BUMAK (Bogazici University Caving Club) and on the right side Prof. Raymond Hovasse's maps of the cave, which is in Istanbul-Turkey. Hovasse's map was drawn at 1927, making it one of the earliest cave maps of Turkey. There is roughly 60 years difference between those two cave maps. BUMAK measured the cave as 1021 m's. If you consider that Hovasse surveyed that long and difficult cave only with 2 other people and with very simple equipments of that time, you may only congratulate that geography professor's effort and unbelievable precision.