

## トピックス 「高松塚古墳と南海地震」

平成18年10月から実施している高松塚古墳の墳丘調査で、版築層を突き破る地割れを多数確認した。地割れは、墳丘の表土層直下から、墳頂下5mの石室床面にまで達し、さらに下層に連続する。こうした地割れは、近年の地震考古学の成果によると、マグニチュード8クラスの巨大地震によって生じたとみられ、奈良盆地南部を90～150年周期で襲う巨大地震、「南海地震」の痕跡と考えられる。西暦700年前後に高松塚が築かれて以降、9回の南海地震が発生しているが、墳丘の損傷がいつの地震によるものかは定かではない。石室直上で平面検出した地割れは、石室の輪郭に沿って直線的に走り、石室の隅から外側へ放射状に派生するなど、直下に位置する石室の形状を見事に映し出していた。地割れは石室の背面に回って空隙をつくり、雨水が石室へ浸透する水みちや、石室への虫の侵入経路になるなど、壁画劣化の遠因となった可能性が高い。最近の南海地震は昭和21（1946）年に発生。今世紀の前半には次の南海地震の発生が予測されている。高松塚に刻まれた地震痕跡を防災対策の教訓としなければならない。

## Topics: Takamatsuzuka Tomb and the Nankai Earthquake

During the excavation conducted in October 2006 at the Takamatsuzuka tomb, a number of fissures splitting the layers of tamped earth were discerned. These fissures extended from just below the surface of the mound down to the floor of the stone chamber 5 m beneath the mound's apex, and continued into the strata further below. Based on the recent fruits of earthquake archaeology, these fissures are thought to have resulted from a severe, magnitude 8-class earthquake, and are traces of the "Nankai earthquake" thought to hit the southern Nara basin on a cycle of 90 to 150 years. After the construction of the Takamatsuzuka tomb around the year 700, there have been nine recurrences of the Nankai earthquake, though it is not certain which of these caused the damage to the mound. Fissures detected at horizontal level just above the stone chamber extending along straight lines following its outlines, and radiating outward from its corners, splendidly reflecting the shape of the stone chamber just below. It is highly likely that these fissures, by creating gaps behind the chamber walls, served as pathways for rainwater and insects to penetrate the chamber, thereby contributing remotely to the deterioration of the murals. The most recent Nankai earthquake occurred in 1946. The next occurrence is expected to come in the first half of the current century. It is vital that we take lessons for measures against natural disasters from the earthquake traces found at the Takamatsuzuka tomb.



墳丘内を縦横に走る地割れ痕跡  
Earthquake traces running along the length and breadth of the mound



石室の輪郭を示す石室直上の地割れ  
Fissures immediately above the stone chamber, indicating its outline



現地見学会風景  
Public site viewing



石室に沿って版築を突き破る地割れ  
Fissures following the stone chamber, splitting layers of tamped earth