

## A clinical feature of myocardial stunning associated with acute myocardial infarction

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We report a case of myocardial stunning after acute myocardial infarction. In the hyperacute phase of myocardial infarction, the patient's coronary arteries showed normal features on coronary angiography during extensive ST-segment elevation observed on a standard 12-lead electrocardiogram and extensive akinesis observed on a left ventriculogram. Thallium-201 emission computed tomography revealed extensive perfusion abnormality. In the chronic phase, the perfusion abnormality was markedly improved. However, the electrocardiogram demonstrated poor R wave progression, and the left ventriculography revealed slight hypokinesis in the anterolateral wall. The acetylcholine provocation test disclosed coronary vasospasm of the left anterior descending coronary artery. About six months thereafter, left ventricular wall motion became completely normal and no poor R wave progression was observed on the electrocardiogram. The findings in this case indicate that myocardial stunning resulted from brief but severe ischemia due to vasospasm which led to cardiogenic shock, and that the recovery of findings for thallium-201 perfusion might be followed by those of electrocardiography and left ventriculography in the stunned myocardium.

**Key words:** Stunned myocardium, acute myocardial infarction, thallium-201 scintigraphy, left ventriculography