90. Activities of the Somatosensory Cortex as well as the Nucleus Centrum Medianum in the Perception of the Splanchnic Information

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We have already reported that the splanchnically driven unitary discharge (DU) from the CM neuron, which played an important role in the perception of the viscerosensory information, were inhibited by the extensive strychnization of the cerebral cortex, while spontaneous unitary discharge (SU) were facilitated. On the other hand, an entire decortication showed just reverse effect. The present report was about the effects of the stimulation of more localized regions of the cortex, such as S_I and S_{II} .

Effect on DU of the CM neuron.

1. Either single shock stimulation or repetitive stimulation with 10 cps of the S_I exhibited no facilitation of DU in any neuron, inhibition of DU in 43.5% of the CM neuron and caused no effect on DU in 56.5% of the CM neuron.

2. Single shock stimulation of the S_{II} exhibited a facilitation of DU in 66.8% of the CM neuron, an inhibition of DU in 14.3% of the CM neuron and caused no effect on DU in 18.9% of the neuron. The repetitive stimulation of S_{II} with 10 cps exhibited a facilitation of DU in 25.0% of the CM neuron an inhibition of DU in 16.7% of the CM neuron and no effect on DU in 58.3% of the CM neuron.

Effect on SU of the CM neuron.

1. Stimulation of the S_I exhibited a facilitation of SU in 23.0% of the CM neuron, an inhibition of SU in 53.8% of the CM neuron caused no effect on SU in 7.7% of the CM neuron.

2. Stimulation of the S_{II} exhibited a facilitation of SU in 16.7% of the CM neuron, an inhibition of SU in 16.7% CM neuron and no effect on SU in 50% of the CM neuron. In the remaining neurons, SU developed groupingly after cessation of stimuli.