

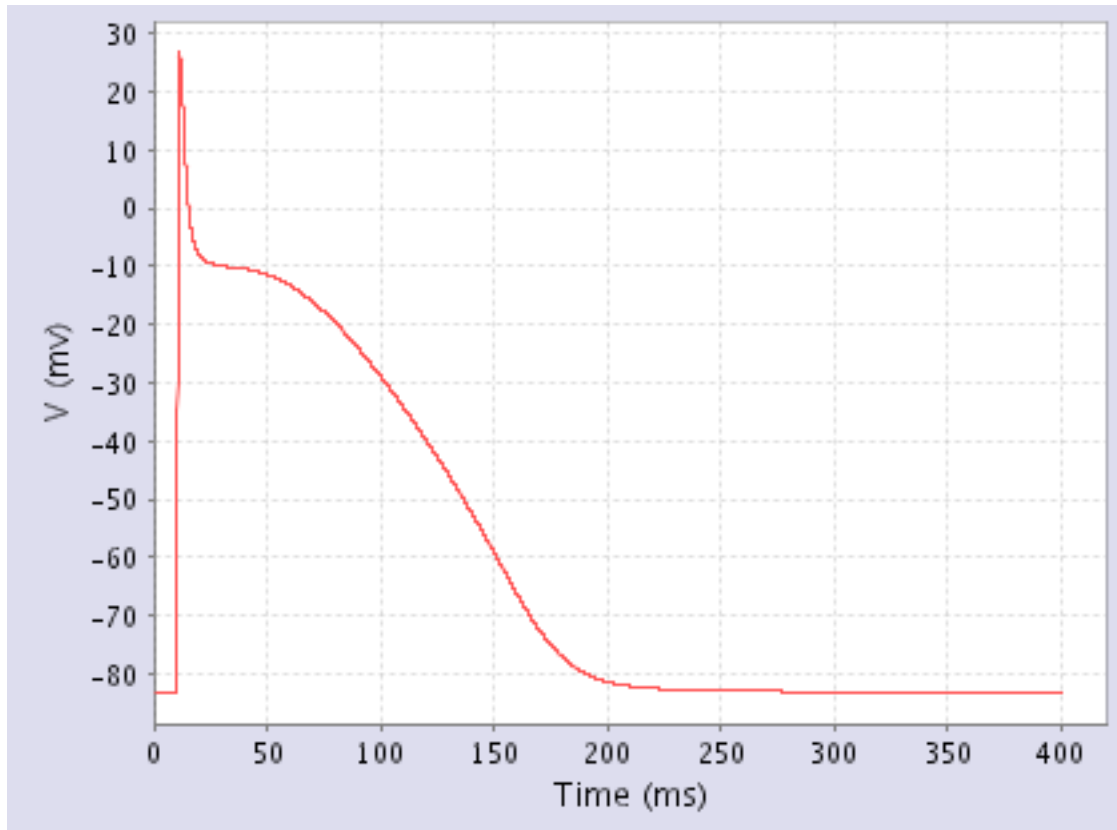
# Ramirez, Nattel, Courtemanche Model of Canine Atrial Cardiac Action Potentials, 2000

**v. 1.4**

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## 1. Description



Example action potential (BCL = 400 ms).

This model simulates canine atrial action potentials. The model's formulation is based on Luo-Rudy II guinea-pig ventricular model with currents modified to mimic the configuration of canine atrial action potential.

Abstract excerpt: *"To obtain insights into the ionic mechanisms governing canine atrial AP properties, we incorporated formulations of  $K(+)$ ,  $Na(+)$ ,  $Ca(2+)$ , and  $Cl(-)$  currents, based on measurements in canine atrial myocytes, into a mathematical model of the AP."*

## 2. References

- Ramirez RJ, Nattel S, Courtemanche M.  
Mathematical analysis of canine atrial action potentials: rate, regional factors, and electrical remodeling.

Am J Physiol Heart Circ Physiol. 2000 Oct;279(4):H1767-85.  
PMID: [11009464](#)

### 3. Ordering

- [Order](#) this model via a secure site.