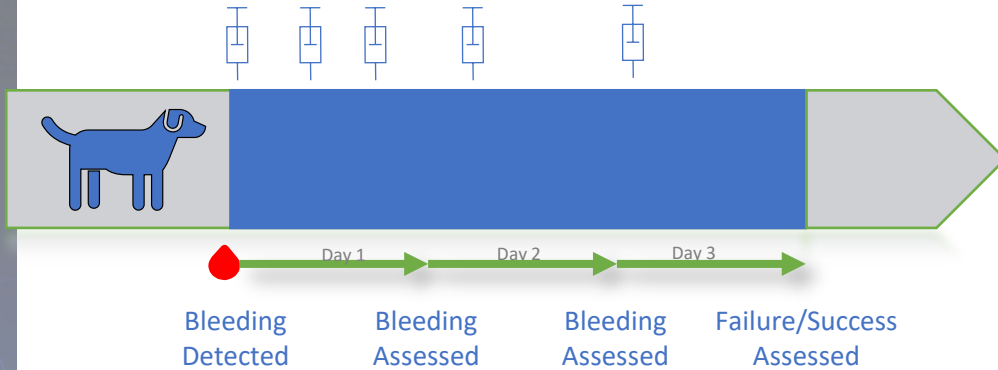




SUBCUTANEOUS MARZEPTACOG
ALFA ACTIVATED (MARZAA) IS
EFFECTIVE FOR ON-DEMAND
TREATMENT IN DOGS WITH
HEMOPHILIA A

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Evaluate SQ MarzAA treatment of bleeding in Hemophilia A dogs



- + Five hemophilia A dogs with spontaneous bleeding were administered SQ MarzAA to control the bleeding
- + SQ MarzAA 60 to 120 $\mu\text{g}/\text{kg}$, at 3-hour intervals
 - + Up to 3 doses on first day
 - + Can receive dose(s) each of following 2 days

Assessment of effect

- + Clinical monitoring
- + Hematocrit, Kaolin TEG profile

Clinical signs of bleeding cessation

- + Success: return dog to colony
- Failure: institute rescue therapy with IV MarzAA

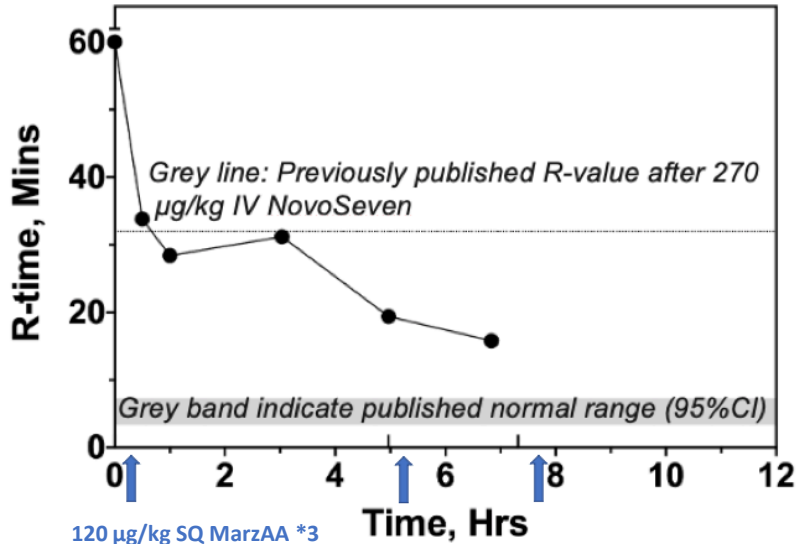


Normalization of TEG with SQ MarzAA treatment

- 3 of 5 TEG tracings had improvement equivalent to IV NovoSeven

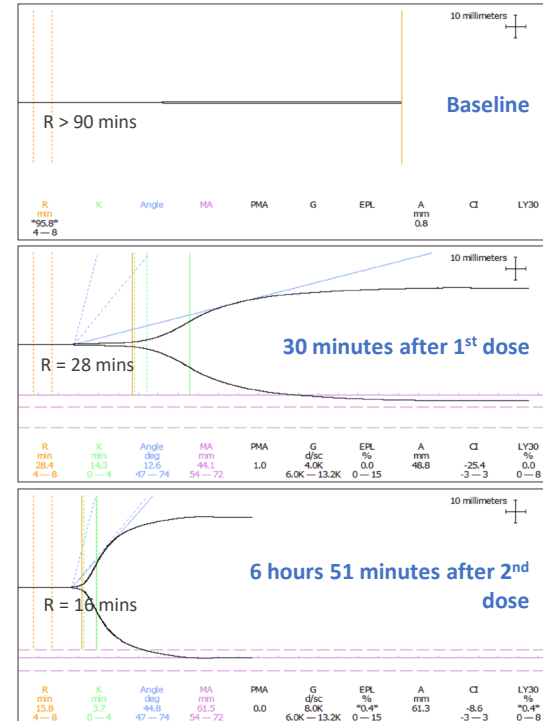
Case V30

This dog did not need therapy beyond hour 8



- SQ MarzAA rapidly improves TEG R-time comparable to 270 µg/kg IV NovoSeven

Case V30 – HA dog – Limb bleed



Excellent on-demand SQ MarzAA treatment of bleeding

Dog	Bleed	Day 1	Day 2	Day 3	Day 4
W03	Left rear leg hematoma	2x 120 µg/kg	Clear improvement	Further improvement	Fully active
V30	Right foreleg bleeding	3x 120 µg/kg	Weight bearing		
R11	Large hematoma left thorax	3x 60 µg/kg	60 µg/kg IV because of erroneous hematocrit		
R04	Right rear leg hematoma	3x 120 µg/kg	2x 120 µg/kg Hematoma decreased in size	2x 120 µg/kg Hematoma almost resolved	
W64	Right rear leg hematoma	3x 120 µg/kg	2x 120 µg/kg	2x 120 µg/kg Starting to bear weight	2x 120 µg/kg Weight bearing

- **Results**

- + Dogs received between 2 & 9 doses of SQ MarzAA over 1 to 4 days
- + Overall clinical response to SQ MarzAA was very positive: bleeding was controlled, and the general condition of the dogs improved so they could be returned to the colony

- **Conclusion**

- + SQ MarzAA appears to be consistently effective as an on-demand treatment of spontaneous bleeding in dogs with hemophilia



Disclosures

- Catalyst Biosciences, South San Francisco, CA, USA sponsored this study
- The authors are employees of Catalyst Biosciences
 - Howard Levy
 - Tom Knudsen
 - Grant Blouse
 - Frank Del Greco
- The authors are employees of University of North Carolina, Chapel Hill, USA and designed and executed this contract study
 - Timothy Nichols
 - Elizabeth Merricks

