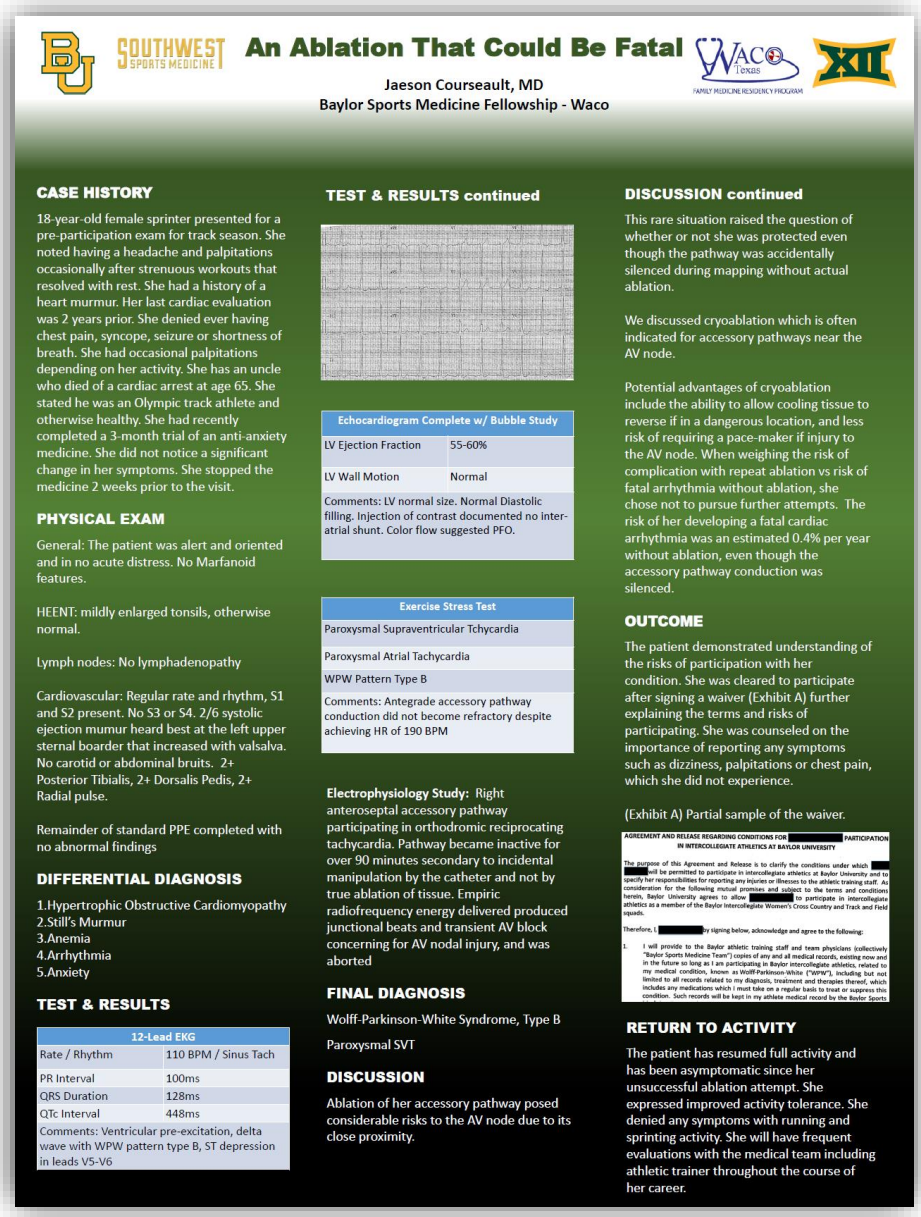
TACSM Case Study and Clinical Teaching Poster Guidelines & Format

Posters should be created in portrait format 36” wide and 48” tall in order to fit our poster stanchions. Please print your poster as a single sheet using your university printing services or printing services at a local copy center or print shop. Case Study and Clinical Teaching Posters should include the same elements found in the abstract that you submitted. Pictures, charts, graphs are encouraged! An examples is provided below:



An Ablation That Could Be Fatal

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CASE HISTORY

18-year-old female sprinter presented for a pre-participation exam for track season. She noted having a headache and palpitations occasionally after strenuous workouts that resolved with rest. She had a history of a heart murmur. Her last cardiac evaluation was 2 years prior. She denied ever having chest pain, syncope, seizure or shortness of breath. She had occasional palpitations depending on her activity. She has an uncle who died of a cardiac arrest at age 65. She stated he was an Olympic track athlete and otherwise healthy. She had recently completed a 3-month trial of an anti-anxiety medicine. She did not notice a significant change in her symptoms. She stopped the medicine 2 weeks prior to the visit.

PHYSICAL EXAM

General: The patient was alert and oriented and in no acute distress. No Marfanoid features.

HEENT: mildly enlarged tonsils, otherwise normal.

Lymph nodes: No lymphadenopathy

Cardiovascular: Regular rate and rhythm, S1 and S2 present. No S3 or S4. 2/6 systolic ejection mumur heard best at the left upper sternal boarder that increased with valsalva. No carotid or abdominal bruits. 2+ Posterior Tibialis, 2+ Dorsalis Pedis, 2+ Radial pulse.

Remainder of standard PPE completed with no abnormal findings

DIFFERENTIAL DIAGNOSIS

1.Hypertrophic Obstructive Cardiomyopathy
2.Still’s Murmur
3.Anemia
4.Arrhythmia
5.Anxiety

TEST & RESULTS

12-Lead EKG	
Rate / Rhythm	110 BPM / Sinus Tach
PR Interval	100ms
QRS Duration	128ms
QTc Interval	448ms
Comments: Ventricular pre-excitation, delta wave with WPW pattern type B, ST depression in leads V5-V6	

TEST & RESULTS continued

Echocardiogram Complete w/ Bubble Study	
LV Ejection Fraction	55-60%
LV Wall Motion	Normal
Comments: LV normal size. Normal Diastolic filling. Injection of contrast documented no inter-atrial shunt. Color flow suggested PFO.	

Exercise Stress Test
Paroxysmal Supraventricular Tchycardia
Paroxysmal Atrial Tachycardia
WPW Pattern Type B
Comments: Antegrade accessory pathway conduction did not become refractory despite achieving HR of 190 BPM

Electrophysiology Study: Right anteroseptal accessory pathway participating in orthodromic reciprocating tachycardia. Pathway became inactive for over 90 minutes secondary to incidental manipulation by the catheter and not by true ablation of tissue. Empiric radiofrequency energy delivered produced junctional beats and transient AV block concerning for AV nodal injury, and was aborted

FINAL DIAGNOSIS

Wolff-Parkinson-White Syndrome, Type B

Paroxysmal SVT

DISCUSSION

Ablation of her accessory pathway posed considerable risks to the AV node due to its close proximity.

DISCUSSION continued

This rare situation raised the question of whether or not she was protected even though the pathway was accidentally silenced during mapping without actual ablation.

We discussed cryoablation which is often indicated for accessory pathways near the AV node.

Potential advantages of cryoablation include the ability to allow cooling tissue to reverse if in a dangerous location, and less risk of requiring a pace-maker if injury to the AV node. When weighing the risk of complication with repeat ablation vs risk of fatal arrhythmia without ablation, she chose not to pursue further attempts. The risk of her developing a fatal cardiac arrhythmia was an estimated 0.4% per year without ablation, even though the accessory pathway conduction was silenced.

OUTCOME

The patient demonstrated understanding of the risks of participation with her condition. She was cleared to participate after signing a waiver (Exhibit A) further explaining the terms and risks of participating. She was counseled on the importance of reporting any symptoms such as dizziness, palpitations or chest pain, which she did not experience.

(Exhibit A) Partial sample of the waiver.

AGREEMENT AND RELEASE REGARDING CONDITIONS FOR [redacted] PARTICIPATION IN INTERCOLLEGIATE ATHLETICS AT BAYLOR UNIVERSITY

The purpose of this Agreement and Release is to clarify the conditions under which [redacted] will be permitted to participate in intercollegiate athletics at Baylor University and to specify her responsibilities for reporting any injuries or illnesses to the athletic training staff. As consideration for the following mutual promises and subject to the terms and conditions herein, Baylor University agrees to allow [redacted] to participate in intercollegiate athletics as a member of the Baylor Intercollegiate Women's Cross Country and Track and Field squads.

Therefore, I [redacted] by signing below, acknowledge and agree to the following:

1. I will provide to the Baylor athletic training staff and team physicians (collectively "Baylor Sports Medicine Team") copies of any and all medical records, existing now and in the future so long as I am participating in Baylor intercollegiate athletics, related to my medical condition, known as Wolff-Parkinson-White ("WPW"), including but not limited to all records related to my diagnosis, treatment and therapies thereof, which includes any medications which I must take on a regular basis to treat or suppress this condition. Such records will be kept in my athlete medical record by the Baylor Sports

RETURN TO ACTIVITY

The patient has resumed full activity and has been asymptomatic since her unsuccessful ablation attempt. She expressed improved activity tolerance. She denied any symptoms with running and sprinting activity. She will have frequent evaluations with the medical team including athletic trainer throughout the course of her career.

PLEASE NOTE: The example above is of a Case Study Poster. Clinical Teaching Posters should look similar, but include different sections: CLINICAL PRESENTATION & EXAM, ANATOMY & PATHOLOGY, DIAGNOSTIC TESTING & CONSIDERATIONS, TREATMENT & RETURN TO ACTIVITY.