Building a successful AFib program that can withstand a pandemic.

Spectrum Health of Grand Rapids, MI, AFib Clinic comprises an advanced practice and RN-run clinic for the early evaluation and treatment of new or recurrent atrial fibrillation. Utilizing evidence and guideline-based protocols, Spectrum has established a multi-disciplinary approach that leads patients from various referral pathways to the AFib specialists in a timely manner. They provide patients with a comprehensive evaluation and management of their condition.

Because of Spectrum’s referral pathways, when COVID-19 struck, they were able to pivot and implement telehealth quickly. Use of the Zio monitor, through iRhythm’s home enrollment program, helped to enable this transition. Since the COVID-19 crisis and recovery, Spectrum Health continues to implement a hybrid approach comprised of in-office and virtual appointments. This flexible care model allows Spectrum Health to continue to provide care to their patients.

ABOUT SPECTRUM HEALTH

14 Hospitals
155 Ambulatory Sites
40,000 Telehealth Visits
4,500 Physicians & Advanced Practice Practitioners

EP Program:
8 Physicians
Largest clinical volume in Michigan
Objectives of the AFib Clinic
1. Ensure timely patient access:
   - Referral Appointment within 48-72 hours.
2. Standardized one-hour RN visit:
   • AFib education (APP and RN)
   • Initiate patient specific treatment plan
   • Focus on risk factors
   • Monitoring/testing: Zio, echo, sleep study
3. Establish follow-up visit with general cardiology or EP

Pathways to the AFib Clinic
At the core of Spectrum Health’s AFib Clinic is a multi-disciplinary referral pathway.

90% of patients are referred by primary care and ED.

Continuity of care
By rapidly shifting from traditional in-clinic visits to a flexible telehealth model and utilizing Zio Home Enrollment, Spectrum was able to maintain patient volume with a constant number of EPs who were flexibly deployed.

Multi-use monitors such as Holters have been eliminated.

Pre COVID-19: Procedures scheduled as normal
Peak COVID-19: Cancelled all elective cases
Early Recovery / New Normal: Elective procedures resumed

Recovery Mode: Shifting to the new normal
A hybrid approach
This flexible care model continues using a hybrid in-clinic/telehealth approach. It allows Spectrum to provide continuity of care for their patients, as well as:
1. Safely bringing back elective procedures with standard follow-up protocols.
2. Optimize patient access via protocols and pathways with their AFib program.
3. Expand cardiac monitoring services via Zio Home Enrollment.
4. Increase patient access by moving from referral to appointment within 48-72 hours

Pre COVID-19 Crisis Mode: COVID-19 response
Continuity of care
By rapidly shifting from traditional in-clinic visits to a flexible telehealth model and utilizing Zio Home Enrollment, Spectrum was able to maintain patient volume with a constant number of EPs who were flexibly deployed.

Multi-use monitors such as Holters have been eliminated.

EP Team Care Model Pre COVID-19 Peak COVID-19 Early Recovery New Normal
Rounder/Lab 1 1 1 1
Lab 3 0 3 3
In-Office 4 0 1 3
Virtual 0 7 3 1
Total number of EPs 8 8 8 8

AFIB CLINIC
Primary Care
CT Surgery
Cardiology
Cardiology
Surgery
Neurology
Anti-Coag Clinic
Sleep Medicine
CV Imaging
Metabolic Wellness Program
AFib & Device Clinic
Structural Heart

Flexible care model In-office appointment Telehealth appointment
Pre COVID-19 95% 5%
Peak COVID-19 10% 90%
Early Recovery 50% 50%
New Normal 75% 25%

Pre COVID-19: Procedures scheduled as normal
Peak COVID-19: Cancelled all elective cases
Early Recovery / New Normal: Elective procedures resumed

Pre COVID-19: Procedures scheduled as normal
Peak COVID-19: Cancelled all elective cases
Early Recovery / New Normal: Elective procedures resumed
PATIENT HISTORY
56 y/o female with HTN, DM, obesity

POINT OF ENTRY
ED

INITIAL DIAGNOSIS
4/12/2020 presents in ED due to rapid palpitations persisting for several hours
ECG showed AF at 135 bpm, BP 120/50
“AFib ED to Clinic” pathway followed:
- Given IV metoprolol followed by PO metoprolol and DOA, Converted to sinus after 1 hour in ED
- Referred to AFib Clinic and discharged

AFIB CLINIC
SCREENING & TESTING
4/14/20 seen in AFib Clinic by APP via telehealth
Comprehensive evaluation focusing on risk factor modification
Maintained on BB/DOAC, referred for Zio XT Home Enrollment, echo, home sleep study
14 day Zio XT showed no AF. Normal echo

FOLLOW-UP CARE
Visit with EP scheduled for 7/2020

Comprehensive evaluation for AFib with no hospital admission or in-person office visit during COVID-19
<table>
<thead>
<tr>
<th>PATIENT HISTORY</th>
<th>66 y/o male with PMH only of hyperlipidemia</th>
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</thead>
<tbody>
<tr>
<td>POINT OF ENTRY</td>
<td>PCP</td>
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<tr>
<td>INITIAL DIAGNOSIS</td>
<td>2/24/20 presents to PCP with complaints of increased fatigue for several weeks</td>
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<tr>
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<td>Discovered to be in AF with HR 130 bpm and BP 140/90, no acute distress</td>
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<tr>
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<td>PCP refers to AFib Clinic</td>
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<tr>
<td>AFIB CLINIC SCREENING &amp; TESTING</td>
<td>2/26/20 Seen in AFib Clinic. ECG shows AF at 150 bpm, no acute distress. Starts on DOAC, metoprolol. TEE/DCCV ordered</td>
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<td>2/27/20 TEE/DCCV performed, EF 35% thought to be tachycardia mediated cardiomyopathy. Zio XT applied immediately following CV, per protocol</td>
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<tr>
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<td>2/27/20-3/8/20 Zio XT shows PAF with avg HR 100 bpm. 72% AF burden. EP calls patient to start on amiodarone and repeat Zio XT planned for after amiodarone load</td>
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<tr>
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<td>3/19/20-4/3/20 Repeat Zio XT via Home Enrollment shows 10% AF burden, despite amiodarone</td>
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<td>4/28/20 Repeat echo shows EF improved to 60%</td>
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<tr>
<td>FOLLOW-UP CARE</td>
<td>4/29/20 Patient seen by EP via telehealth visit. Opted to have PVI ablation for AF</td>
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<tr>
<td>TREATMENT PLAN</td>
<td>5/20/20 AF ablation performed with same day discharge. Amiodarone discontinued</td>
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