

An Al-Enabled Clinical Trial Program's Impact on Patient Screening and Trial Enrollment in 2024

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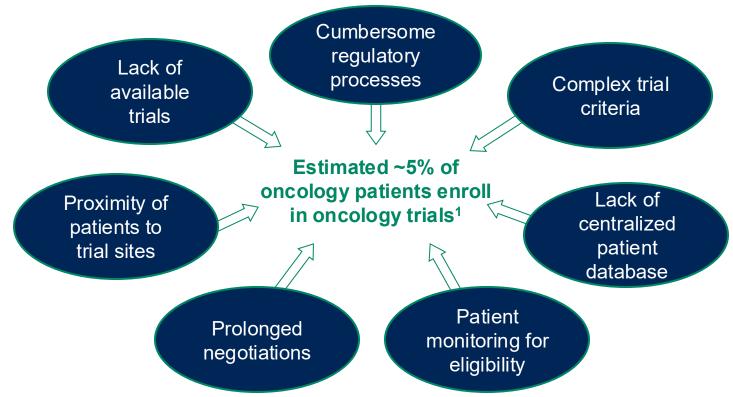
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Insufficient Accrual Into Oncology Trials Is a Well Established Complex Problem



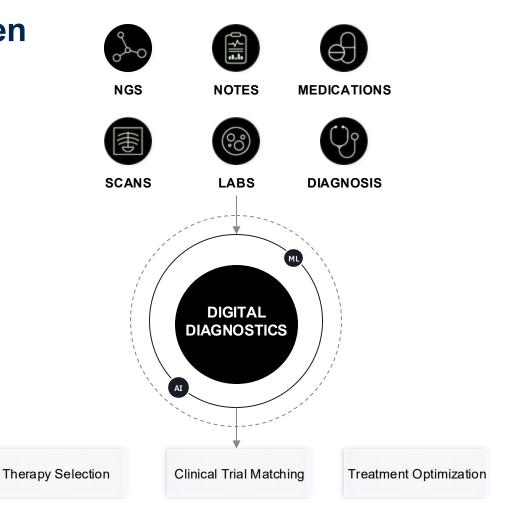






Tempus AI is Data-Driven Precision Medicine

Tempus Al's mission is to bring the power of technology, data, and Al to doctors by building a leading precision medicine platform in the world - ultimately helping doctors make better decisions and help ensure patients live longer and healthier lives.







The Tempus Al TIME Program

- Pre-screening support via technical solutions and research nurse navigators
- Standardized trial startup process eases administrative burden
- 10-day Just-In-Time (JIT) activation allows providers to open trials in response to patient need
- Program highlights:
 - 40,000+ patients identified for potential enrollment
 - 1,000+ clinical trials have been active
 - - ~10% AMC
 - ~90% Community









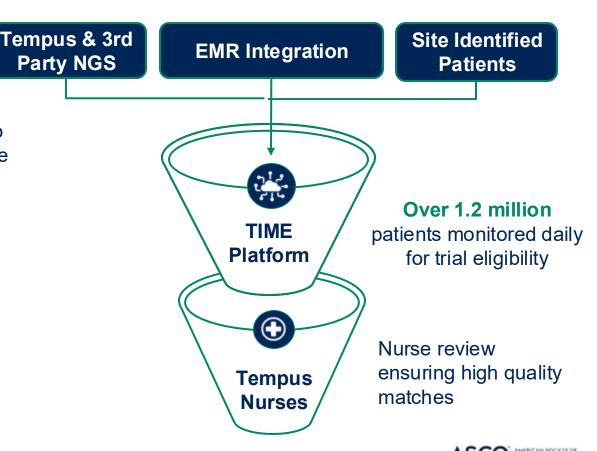




Patient Matching with Al Assistance

Party NGS

- NGS & EMR data ingested into the TIME platform
- Trial eligibility criteria coded into the platform & Natural Language Processing models deployed
- Algorithmic matches identified
- Tempus nurses confirm matches
- High-quality matches sent to clinical site







Tempus Al TIME Program Clinical Trial Activation



Central IRB to streamline regulatory submissions



Standardized Clinical
Trial Agreement for all
sites, eliminating
repetitive, prolonged
negotiations



Rate Card with prenegotiated costs

Just in Time

Occurs when a patient has been identified and needs to be immediately enrolled in the trial **Prospective**

Patient(s) not yet identified but clinical site opens trial with expectations to enroll subjects







Just in TIME Trial Activation

Example Timeline of Patient Enrollment

Day 0	Day 1	Day 2	Day 4	Day 5	Day 6	Day 7	Day 10
•	•	•	•	•	•	•	— ~
PI signs rapid activation	Essential documents collected and	Budget, contract, and rider fully	Lab kits delivered		Patient consented	Patient enrolled and	
request form	provided to sponsor	executed	IRB approval complete		Green light letter received	Screening dosed successfed procedures started	successfully
		submission complete			Patient picked up ICF		

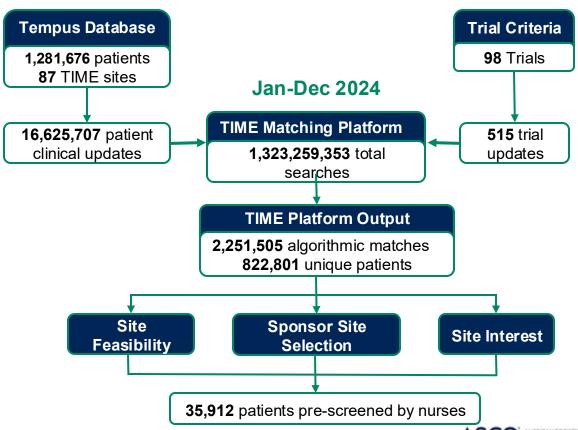






Tempus AI TIME Program Patient Matching Data

- Continuously receives data
- Searches for new patients and others with updated medical data
- Searches occur as new trials are on-boarded and when trial criteria amendments occur









Tempus Al TIME Program Clinical Trial Activation Data

Activation Type	Total Activations	Median Activation Time	
Just in Time	82	13 days	
Prospective	104	33.5 days	

Median time from JIT activation to first consent for interventional trials was 4 days



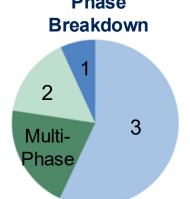




Tempus Al TIME Program Patients Screened & Consented Data

Screening and Enrollment						
Nurse screened patients	35,912					
Interventional matches	5,034					
Interventional consents	225					
Observational consents	348					
Total consents	573					

Interventional Consent Insights Phase Most Common



Most Common Cancer Types

- Breast
- NSCLC
- CRC
- Prostate
- Pancreatic

- 57% Phase 3
- 15% Phase 2
- 7% Phase 1, 5 consents from FIH trials







Al Facilitates Large-Scale Clinical Trial Enrollment

Used patient data & trial criteria to generate matches

Tempus TIME Platform

Rapid Activation

JIT & prospective activations demonstrated rapid trial initiation

Average of 1.57 consents per day over 1 year

Tempus Al Time Program

Next Steps

Employing LLMs to improve matching quality and efficiency







Authors & Acknowledgements

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How Al Helped Clinical Trials Find and Enroll Patients in 2024

What did this research tell us?

• The Tempus Al TIME program provides enhanced patient pre-screening and streamlines study start-up for oncology clinical trials, resulting in increased trial enrollment

Who does this research impact?

 The TIME program is a potential solution for academic and community-based research sites seeking to improve identification of patients that may be eligible for a clinical trial and wishing to leverage operational efficiencies to rapidly activate new studies

What does this mean for patients right now?

 The TIME program allows more patients to receive access to cutting-edge clinical trials closer to home





