

How Coactive Care[™] Delivers Better Patient Outcomes

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EXECUTIVE SUMMARY

In a rush to introduce post-acute care services to the home, health systems exported hospitalbased roles, processes, and systems into new care delivery programs — with little success.

Traditional acute care delivery models are burdened with ancillary scale and administrative overhead required to manage complex care episodes. Their complicated staffing, logistics, reimbursement, and information systems are ineffective at supporting simpler remote care requirements.

As a result, traditional health system virtual care services — including telehealth, chronic care management (CCM), remote patient monitoring (RPM), and transition care management (TCM) — are seeing poor clinical and financial outcomes.

In practice, acute and ambulatory care models stop at the facility doors. While patients are given self-care instructions as the last step before they leave the hospital or their doctor's office, current care models leave a large gap in supporting their ongoing care, behavior change, and outcome reinforcement after they walk out the doors.

Coactive Care anchored by Hippo Virtual Care[™] — an augmented reality platform purpose-built for clinicians — can close that gap.

The term "Coactive Care" refers to a collaborative care model involving the active participation of multiple healthcare providers and patients. Professionals from different disciplines, including caregivers and family, form a "circle of care" to work together delivering comprehensive care for patients.

This method improves accountability in point-of-care decision-making by providing immediate remote support and including the care circle in patients' care plans, goals, activities, and outcomes. Strong caregiver relationships and in-person support encourage patient commitment and adherence.

By providing care to patients — and, more importantly, helping patients provide their own self-care — wherever they are, Coactive Care helps health systems treat more patients while freeing up hospital beds and reducing the burdens associated with ancillary scale and administrative overhead. The addition of a new Clinician Extender[™] role providing expert in-person guidance, education and support — aided by the Hippo Virtual Care Platform — brings the Coactive Care team full circle to support patients wherever they are outside doctor's offices and hospital walls.

The Hippo Virtual Care platform enables true remote collaboration and team-based learning by leveraging Assisted Reality (AR) headsets. Hippo provides the latest in voice-activated, hands-free, remote collaboration and data capture technology with the world's most advanced wearable computer platform, providing a "you are there" virtual experience for remote experts.

Remote experts require a transparent "I see what you see" technology as they work closely with their Clinician Extenders and patients to assess, diagnose, guide, and reinforce patient care. Clinician Extenders need a non-obtrusive technology that allows them to work naturally in a hands-free way that does not distract them from their prime focus on the patient.

Hippo's platform meets the Coactive Care needs of both, providing the evidence and confidence they need to comfortably share information, make decisions, and guide patient evaluations and treatment efficiently.

Introduction

Contrary to conventional wisdom, it's not what patients see or hear from their physicians that has the biggest impact on their health. It's what they do with that information.

Under the current ambulatory care delivery model, physicians and other healthcare professionals spend more time assessing and monitoring patients than they do supporting patients' actions and behaviors that positively affect their health — arguably the most important aspect of patient care.



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In an age when physicians can see more than 35 patients a day — and spend a considerable portion of each day multitasking on their EMR — patients are lucky to be seen for more than 10 minutes. As a result, patients forget 40-80% of the information and instruction from their office visits.¹ Medication adherence rates hover around 50%, as well.²

For example, studies show that "elderly patient medication compliance rates range roughly from 38% to 57% with an average rate of less than 45%.³ A major reason for non-adherence is higher patient-physician discord leading to decreased patient satisfaction."⁴

This discord is the result of siloed medical practice, where numerous uncoordinated providers give multiple orders for patients to integrate, navigate, and execute their self-care with little support other than physician order sheets and call centers.

In response to patients' growing need for more assistance and support for completing their daily healthy actions, providers have developed new products and services, including collaborative care, chronic care management, connected care, care coordination, transition care, and remote patient monitoring.

The trouble is that all of these products and services focus on assessing or auditing patients' care rather than promoting self-care actions, leaving a large gap in their care journey.

Patients simply want (and need) a little help doing the right things the right way at the right times.

Fueled by a powerful, immersive platform like Hippo Virtual Care™, Coactive Care is the ideal "next practice" to give patients the help they need.

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What is Coactive Care?

Individual patient behavior change focuses on preparing, doing, and reinforcing specific healthy actions. These actions are tasks that patients learn and repeat, like taking medications, eating healthy foods, stopping unhealthy habits, taking walks, doing therapeutic exercises, changing wound dressings, and getting to sleep on time. It's important that these actions happen at their scheduled times, not days before or after. And since it's the patient who is doing the actions — or the changing — the supporting providers need to work with the patient rather than just assess or audit their care.

Effective patient behavior change first requires planning and preparation, including setting medical goals, gaining knowledge, learning new skills, assuring abilities, and getting supplies and/or medications.

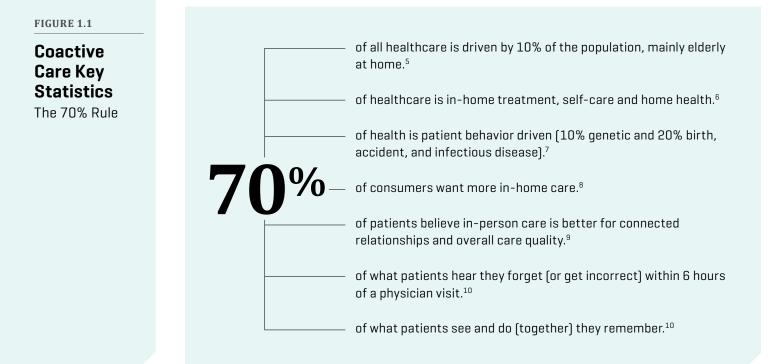


FIGURE 1.2

10 Patient Behavior Change Essentials

01	Focus on specific patient goals, actions and outcomes	06	Give prompts and checklists as task aids for the patient to do the required behavior
02	Educate the patient with knowledge, skills and abilities for the required action/behavior	07	Offer immediate feedback and measures to confirm that the behavior was successful
03	Prepare the environment with the supplies, meds, equipment and systems required	08	Reward and reinforce healthy behavior and redirect/correct ineffective behavior
04	Remove the unhealthy factors from the environment (prompts for unhealthy behavior)	09	Anchor healthy outcomes back to specific behavior to reinforce new behavior
05	Provide assisting relationships (caregiver) to help the patient learn and do the behavior	10	Repeat daily (for weeks) until the new healthy behavior becomes routine

Second, patients need to act, including responding to activity prompts, using task aids, receiving personal support (by caregivers), doing the care tasks, and focusing on clear completion targets.

Lastly, patients need immediate feedback, rewards, and redirection help to check, reinforce, and correct their new behavior[s] for improved results. In behavioral science, these three steps are called antecedents, behavior, and consequences (ABC). Behavioral science has extensively studied patient behavior and provides proven insights for improving patient healthy behavior and healthier outcomes.

While patients are given self-care instructions as the last step before they leave the hospital or their doctor's office, current care models leave a large gap in supporting their ongoing care, behavior change, and outcome reinforcement after they walk out the doors.

Coactive Care can close that gap.

Coactive means "acting together," while the term "Coactive Care" refers to a concerted collaborative care model that involves the active participation of various healthcare providers and patients. In such a system, professionals from different disciplines, including caregivers and family, form a "circle of care" team to work together to deliver comprehensive care to patients.

The key to Coactive Care is "doing together" in-person to improve patient learning and increase patients' commitment to compliant healthy behavior with personal reinforcement to build repetition.

By asking how to improve patients' adherence to their care goals, we focus on improving patients' compliance to healthy actions and behavior.

By improving their healthy behavior, they improve their health outcomes.



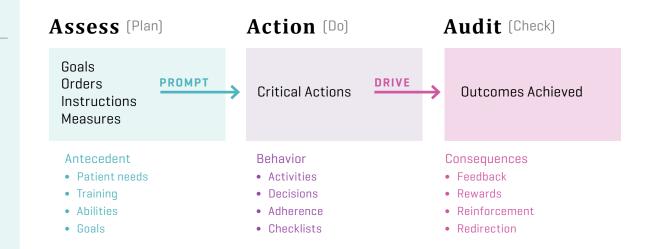
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The Benefits of Coactive Care

The current ambulatory care delivery model has counterparts to the three behavioral steps that include Assess (Plan), Action (Do), and Audit (Check). (See illustration below.)

Currently, assessments happen periodically in a physician's office, actions are completed daily by patients outside the office, and auditing is performed by nurses remotely (by phone) on a monthly basis. Of these three steps, the second (Action) is the least supported, but is essential in changing patient behaviors and outcomes.



Coactive Care is a much broader care delivery model.

The opportunities it provides extend into the home, into community/rural clinics, into the field with first responders, and into nursing homes and skilled nursing facilities. It can even be deployed within multi-hospital health systems.

The essential change from "controlling patient compliance" to "coactive patient behavior change" requires a new focus on self-care, care relationships, and remote care technology. We need to go beyond "telling them the right thing to do" in the office to "helping them do it right" in their daily lives.

By focusing on self-care, Coactive Care improves patients' healthy actions, and provides wide-ranging care support that guides patients in learning and adopting these new behaviors wherever they are. It enhances care delivery by making each step more immediate and effective at changing patients' behavior and routines.



FIGURE 1.3

Agile Behavior Change

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LET'S SPELL OUT THE BENEFITS OF COACTIVE CARE

${f C}$ ollaborative problem solving	Coactive Care teams extend beyond the traditional provider/nurse transactional care models. Coactive Care "connects actions" to engage and support remote caregivers performing point-of-care activities.
${f 0}$ pen communication	Coactive Care teams work together and share information across an extended "circle of care" team that includes the patient, primary physicians, specialists, clinicians, family, caregivers, health coaches, and other medical providers.
${f A}$ ccountable roles and workflow	Coactive Care improves accountability in point-of-care decision-making by providing immediate remote support and including the care circle in patients' care plans, goals, activities, and outcomes. Strong caregiver relationships and in-person support encourage patient commitment and adherence.
C apacity-building	By providing care to patients — and, more importantly, helping patients provide their own self-care — wherever they are, Coactive Care helps health systems treat more patients while freeing up hospital beds and reducing the burdens associated with ancillary scale and administrative overhead.
${f T}$ reat and train	Coactive Care focuses on self-care learning and behavior reinforcement. Care team members reinforce patient self-care compliance and redirect patient relapses to build long-term healthy behaviors and daily care habits.
${f I}$ nformed decision-making	Remote expert support for local patient care actions improves outcomes by actively supporting decision- making and engaging the patient care team in a holistic understanding of the causes, cures, and consequences of patients' chronic conditions.
${f V}$ alue-driven	Coactive Care not only improves patient care quality and satisfaction, but it can also help health systems achieve better quality outcomes per dollar spent on care.
${f E}$ fficient and effective	Remote expert models (Clinician Extenders) serve as staff multipliers by reducing provider travel, care delays, and coordination/handoffs to make providers more productive.



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What's Needed to Deliver Coactive Care?

By including the extended care circle of providers and caregivers in care planning and communication, Coactive Care focuses on integrated care plans and daily checklists that guide patient healthy actions and outcomes.

The addition of a new Clinician Extender role providing in-person support — aided by the Hippo Virtual Care Platform — brings the Coactive Care team full circle for patients wherever they are outside doctor's offices and hospital walls.

Developed by clinicians for clinicians, the Hippo Virtual Care platform enables true remote collaboration and team-based working and learning by leveraging Assisted Reality (AR) headsets. Hippo provides the latest in voice-activated, hands-free, remote collaboration and data capture technology with the world's most advanced wearable computer platform, providing a "you are there" virtual experience for remote experts.

Clinician Extenders are nurses, clinicians, or medical assistants who physically work with patients and assist remote specialty physicians to facilitate expert guidance, educate patients, and support patients' adoption of healthy behaviors.

Remote experts require a transparent "I see what you see" technology as they work closely with their Clinician Extenders and patients to assess, diagnose, guide, and reinforce patient care. Clinician Extenders need a non-obtrusive technology that allows them to work naturally in a hands-free way that does not distract them from their prime focus on the patient.

Hippo's platform meets the Coactive Care needs of both, providing the evidence and confidence clinicians need to comfortably share information, make decisions, and guide patient evaluations and treatment efficiently.



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Getting Started with Coactive Care: Think Big, Start Small, Move Fast

Not only can Coactive Care improve outcomes for patients in the home, it is especially beneficial for patients in a variety of other remote care situations, including nursing homes, rural clinics, urgent care facilities, and community care centers, as well as those treated by EMTs. For patients with numerous chronic conditions — no matter where they are — Coactive Care integrates a range of new healthy behaviors into a complete care plan that is consistent and easy for patients to follow as daily self-care tasks.

Most providers and staff find Coactive Care a refreshing and effective break from the treadmill of high-capacity ambulatory care office models. A patient-focused approach is also appealing to providers burnt out on productivity and performance-based practices. As a result, it is not difficult to find physician and clinician volunteers willing to pilot Coactive Care delivery models.

In addition, piloting Coactive Care and establishing a coactive delivery network can be inexpensive for many health systems, as they already have much of the staff, facilities, and technologies available in current ambulatory care programs.

Not only is Hippo Virtual Care easy to deploy, use, and scale, but it costs just \$10 use case per day and features a simple pricing plan that allows for unlimited participants across your health system. And with significant improvements in productivity, reduction in costs, and over 90% patient and clinician satisfaction — the platform can provide enormous dividends while potentially freeing up 11% of your inpatient hospital capacity. Those benefits are matched only by the platform's ability to deliver specialty remote care to the 15% of high-risk chronic care patients who drive 80% of medical costs.

The best way to judge Coactive Care's effectiveness is to quickly gather a coactive team [a specialist physician and 5-6 staff] using Hippo Virtual Care and let them try it. You can trial the new coactive roles, processes, tools, and techniques with nominal support from IT, HR, legal, or ancillary departments, making it easy to implement and evaluate. Training for the team is so quick and easy you can have a pilot up and running in a day.

Consider choosing a primary care practice located in a residential area with a large number of elderly polychronic patients already served by the health system or physician practice. This may be a Medicare Advantage value-based population that the group can contract to reduce medical loss, or a standard Medicare population that can generate \$400 per patient per month in remote care revenues, based on two physician visits and other remote care reimbursements.

Just as doing together can benefit patients, coactive practice can help your care team learn.

Hippo Virtual Care can help your teams provide better care and achieve better results for their patients by providing the right care at the right time, wherever they are.

COACTIVE CARE IN ACTION Mary's Story

Meet Mary, an 82-year-old mother who lives alone and manages six chronic conditions (asthma, arthritis, diabetes, hypertension, CHF, and depression), as well as other minor illnesses. She is overweight, out of shape, forgetful, and homebound. Her primary caregiver is her daughter, who calls her daily, visits her once a week, and takes her to her medical appointments. Mary is one of 116 million valuebased care patients in the United States who struggle with access to specialty care.

Mary is also visited each month by a home health nurse, who has developed a care plan for Mary and spends each visit evaluating and educating her, as well as documenting her care — with little progress. Mary visits the doctor's office once or twice each month to see her four specialist physicians and her primary care doctor. She takes 10 daily medicines inconsistently and rarely follows the exercise, diet, or lifestyle instructions from her doctors and home health nurse, which she finds confusing. Consequently, Mary has had three ED visits and two hospital inpatient stays this year due to complications from her chronic conditions.

While Mary's primary care physician tried telehealth and remote patient monitoring to improve contact with Mary, as well as her compliance to her self-care, there was little impact. Then, the health system implemented a new Coactive Care program, providing Clinician Extenders to visit patients like Mary and provide them with more hands-on care and support. Mary's primary physician implemented this approach, utilizing a repurposed office medical assistant who visits patients at home, nursing facilities, and hospices. All of Mary's physicians can now work with the Clinician Extender to quickly assess Mary at home with the Clinician Extender's support, using a new telemedicine headset that supports real-time guided care protocols. The extender converted Mary's care plans and orders into a convenient daily health guide checklist to help her organize and comply with her daily care. They also helped Mary develop new, healthy behaviors to help her adhere to better lifestyle habits and daily care activities. The Clinician Extender visits weekly, calls periodically, and reviews Mary's performance and wellness to reinforce her improvement and commitment.

Mary now feels better, in control of her health, and proud of the progress she is making. She is walking daily, eating better, and feeling more energetic and clear-headed. Her daughter is also more confident and capable in supporting her. Mary also has not had any ED visits or experienced any chronic condition complications since her introduction to Coactive Care. Mary's physician is amazed at the progress that Mary is making and is equally pleased with the additional \$400 in monthly revenue from the remote care reimbursement for his telemedicine visits and other Clinician Extender activities.

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Hippo Virtual Care[™]

BRING THE HOSPITAL TO THE HOME AND EXTEND THE REACH OF SPECIALTY CARE

Supercharge your caregivers with wearable voice-enabled computing

Hippo's hands-free, voice-activated, Augmented Reality platform delivers a "through the eyes of the caregiver" viewpoint allowing Specialty Physicians to diagnose and treat patients as if they were in the room.

- Easy to deploy and quick to scale
- Designed by clinicians, for clinicians for ease of use
- Team-based clinical workflow platform
- Increases clinician productivity, reduces costs
- Increases patient and provider satisfaction





Hippo enables seamless collaboration between specialists, nurses and remote caregivers

The Hippo Virtual Care headset delivers a "through the eyes of a caregiver" viewpoint to remote participants and observers.

The Hippo Virtual Care platform allows Specialty Physicians or medical staff to collaborate and conduct real-time patient examinations in the home.

