A BLUEPRINT FOR COMMUNITY-BASED SUSTAINABLE HEALTHCARE
Transforming healthcare in communities, working from the bottom up

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WHO ARE WE?
THE ANH COLLECTIVE

ANH International
Co-creating health by working with nature, not against it
- Campaigns
- Activism
- Research
- Education

Health creation
Implementing health creation through communities in the real world

Individual & community sustainability

Business sustainability
Supporting sustainability in business

Parent: Non-profit / CARE approach

The ANH Collective

ANH Consultancy

B2B support

Charitable Change Programmes
# A Collaboration for Systemic Healthcare Change

**What are the levers for change?**

<table>
<thead>
<tr>
<th>FROM</th>
<th>TO</th>
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<tbody>
<tr>
<td>Focus on diseases</td>
<td>Creating positive wellbeing</td>
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<tr>
<td>Doctors owning your health</td>
<td>You owning your health</td>
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<tr>
<td>Hospitals and clinics as the main setting</td>
<td>Your community as the main setting</td>
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<td>Drug based interventions</td>
<td>Diet and lifestyle interventions</td>
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<td>Symptom-based treatments</td>
<td>Natural balance across all body systems</td>
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<tr>
<td>Patients as passive recipients</td>
<td>Empowered, self-caring citizens</td>
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</table>
The three pillars of sustainability

social

environmental

economic

The Three Pillars of Sustainability
UN AGENDA 2030: RIGHT PROBLEM IDENTIFICATION – WRONG SOLUTIONS

Diet + lifestyle = Key modifiable determinants of good health and well-being

SDG 3
THE URGENT NEED TO TRANSITION FROM REACTIVE TO PROACTIVE HEALTH AND CARE

- Disease burden
- Costs
- Comorbidities
- Disease irreversibility
“TIME FOR A REVOLUTION”


A WORLD FIRST...

health

intersection

sustainability
THE BLUEPRINT PROGRAMME: Proving the concept that has the power to make health care work for people and planet

• In Dec 2018, ANH-I published a report describing a vision and blueprint for health creation in response to the rising burden of global disease and its crippling impact on existing health systems around the world. Rob Verkerk published the first peer-reviewed journal article on the application of sustainability principles to health care in 2009.

• The blueprint provides a framework and a universal language that enables all health professionals, and their communities, regardless of health status, inclusive of complementary and natural solutions, to engage in creating health solutions for themselves and for others while monitoring their effects.

• The blueprint provides a model for health and care that is sustainable. It is based on key principles and learning that have previously been applied to other sectors, such as energy and agriculture.

• The model has an ‘upstream’ focus which views an individual’s ‘health system’ within an ecological context. At its core is the adoption of sustainability principles by healthcare providers, self-care that works with, rather than against, nature, and community-based health hubs that use the model.

• The ‘readiness’ phase of implementation has begun with the intent of building a cross-sector collaboration underpinned with a united movement: partnerships, advisors, influencers and stakeholders. We need to jointly recognise the burning platform; align on the vision and mission; and, mobilise commitment for some meaningful action.

• Consensus on how we design and test the model in the real world, enabled by a technology platform for scalability, will remain central to the implementation to uphold the integrity of the model with science and credible evidence of outcomes.

• The end game is wide scale adoption of the approach across all modalities and ‘natural section’ of health ecosystems (including foods, lifestyles and interventions) that are found to deliver the best outcomes for most people.
... the aim [of the ‘blueprint’] is to propose the basis for a universal approach (‘language’) applicable to an upstream model that includes the evaluation of whole body, multi-system health and resilience through an ecological lens.
UP-STREAMING HEALTH & VITALITY

A Universal Health Assessment System
defined by function, not disease

+ Technology-Enabled, 3-level Guided and Self Care
starting with self, supported by Health Guides

+

A Sustainability Accreditation System for Health Guides & Providers
inclusive of bio-medical and natural health approaches

= Population Health Outcomes

↑ Chronic Disease Burden

↓ Per Capita Health Cost
SEVEN KEY DISRUPTORS OF THE STATUS QUO

1. Upstream
2. Effective self-care
3. Connected
4. Health-centric
5. Participatory
6. Collaborative
7. Community
SOCIETAL AND INDIVIDUAL BENEFITS OF TRANSITION FROM REACTIVE TO PROACTIVE HEALTH AND CARE

- Net disease burden
- Costs
- Productivity losses
- Disease irreversibility risk
- Incidence of comorbidities

Time / individual lifespan

- Typical point of current intervention(s), following pathogenesis
- Duration of primary salutogenesis efforts in sustainable health systems

SOCIETAL

INDIVIDUAL
SHIFTING TO THE RIGHT SIDE OF THE EFFICACY-EFFECTIVENESS CONTINUUM
(after Witt et al., 2014)
The VA Whole Health model consists of 5 components (a-e) and 10 complex interactions (1-10). Source: Atwood et al, *Fam Med.* 2016; 48(9): 711-719

OPTIMISATION OF FUNCTION

NOT PREVENTION OR MANAGEMENT OF DISEASE
ANH 12 Domain Model of the 'Ecological Terrain'

1. Genetic and epigenetic background
2. Glycaemic control and metabolic flexibility
3. Gastrointestinal system and microbiome function
4. Mitochondrial function
5. Immune system function
6. Oxidative stress status
7. Neuroendocrine system function
8. Circulatory system function
9. Toxic burden and biotransformation
10. Structural integrity status
11. Psychological and cognitive function
12. Psychosocial-emotional health status
FROM PATHOGENESIS TO SALUTOGENESIS

Some of the variables in an individual’s life that cause imbalances in one or more domains of the ‘Ecological Terrain’:

- Diet and nutrition
- Physical activity
- Rest and relaxation
- Sleep
- Social connection
- Connection with nature
- Purpose/meaning in life
- Environmental toxins/pollutants
- Radiation sources
- Stress/stress tolerance
### 3 Levels of Assessment Across the 12 Domains

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<tr>
<th>Level</th>
<th>Features</th>
<th>Examples</th>
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</table>
| **Self-Assessment**        | Zero or low cost, no specialized equipment required, symptomology characteristic of dysfunction or imbalance in specific domains | • Glycaemic control: waist to height ratio, blood sugar ‘crashes’  
• Mitochondrial dysfunction: feeling ‘tired all the time’  
• Psychological function: degree of social connection |
| **Guided Assessment**      | Low cost, but relevance of data benefits from interpretation and guidance from health professional | • Toxic burden: evaluation of domestic chemical and air pollution exposure  
• GI system and microbiome: Evaluation of food and symptom diary  
• Psycho-social stress: monitoring of sleep patterns and heart rate variability (HRV) via smartphone app |
| **Practitioner Assessment**| Biomedical and genetic tests                                             | • Genetic and epigenetic background: genetic screening of specific polymorphisms  
• Mitochondrial function: functional screening, patient history, results of functional testing (blood work, organic acids), mitochondrial function profile  
• Oxidative stress: Test for oxidised LDL fractions and advanced glycated end (AGE) products, DNA/RNA oxidative damage assays, assay for activity of antioxidant enzymes e.g. glutathione (GSH), superoxide dismutase (SOD), catalase |
EXAMPLE: INDIVIDUAL ASSESSMENT OUTPUT

ID: Ms A, 53yo, F

Purposes include:
- Tracking by the individual
- Tracking by health and fitness professionals
- Motivation
- Empowerment
- Collaborative and participatory
- Participatory research
10 HALLMARKS OF HEALTH SYSTEM SUSTAINABILITY

- Each individual needs to interact with wider ‘health systems’ that meet specific sustainability criteria
- 10 hallmarks of health system sustainability for health guides and providers

- Reduced pharmaceutical dependency
- Non-pharmaceutical health care approaches
- Economic and environmental sustainability
- Person-centred health care
- Fully informed consent for medical interventions
- Upstream focus and health optimisation
- Routine evaluation or screening
- Biological and genetic potential
- Empowered self-care
- Participatory and collaborative health systems
Implementation
# Key Milestones

## Stage 1
Mobilise commitment & preparation

- **2019**

## Stage 2
Detailed design of trials & launch

- **2020**

## Stage 3
Execution & evaluation of trials

- **2021**

## Stage 4+
Implement at scale

- **2022+**

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<td><strong>Realisation</strong></td>
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### Engagement, Education & Campaigning

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<tr>
<td>Fund-raising II</td>
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<tr>
<td>Communication</td>
<td></td>
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<tr>
<td>‘Recruitment’ activity</td>
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<td>Education Programmes</td>
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### Testing the Concept

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<td>Technology Design &amp; Build</td>
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<tr>
<td>External evaluation</td>
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<td>Trial Design</td>
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<td>Contracting and Approvals</td>
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### Technology Implementation and Evaluation

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Creating Purposeful Engagement

Meticulous testing of the concept

Effectiveness

Wide acceptance of the concept

Participative

Collaborative

Holistic

Inclusive

Transformation Board

Extended

Core

General Public

Trial Participants

Healthcare Providers

Trial Design Groups

Strategic Enablers

Citizen Change Network

Honorary Advisory Committee

Stakeholders

Allies & Advocates

Funds

Relationships

Profiling

Scalability

Designed to foster engagement, involvement and commitment
Consensus between government, stakeholders, health professionals is necessary for rapid transformation towards sustainable health care.

**TRANS-DISCIPLINARY WORKING GROUPS TO DEVELOP CONSENSUS**

- **HEALTH & RESILIENCE EVALUATION**
  - Identify factors, quantitative and qualitative metrics and biomarkers for evaluation of health status and resilience at 3 levels (self-evaluation, guided evaluation and practitioner evaluation).

- **POLICY & REGULATORY EVALUATION**
  - Identify factors and policy/regulatory measures that may help or hinder improved individual self-care and engagement, as well as improved or reduced practitioner, patient or client collaboration or participation status and resilience at 3 levels (self-evaluation, guided evaluation and practitioner evaluation).

- **SUSTAINABILITY EVALUATION**
  - Identify factors and metrics that pertain to sustainability of health systems at individual local community regional scales and national scales.

- **ECONOMIC EVALUATION**
  - Identify approaches and methods relevant to evaluation of economic feasibility, cost/benefit assessment and options for ‘incentivisation’.

- **SOCIAL & ENVIRONMENTAL EVALUATION**
  - Identify factors, methods and metrics that allow evaluation of net social and environmental impacts, both positive and negative, in a diverse range of settings and environments.
Pilot trials in various settings are in the process of being established in the UK to evaluate the effectiveness, safety and sustainability of the collaborative and participatory health models.
From disease-focused healthcare to health creation.
PLEASE CONTACT US

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