SPEYSIDE

CORPORATE AFFAIRS & PUBLIC POLICY

A SIX-PART SERIES

Obesity. The questions we ask.

The science has moved on. Has the system?

Measure · Access · Drivers · Patients · Automation · Inheritance

2026

CONTENTS

Six questions, one thread

INTRODUCTION

Obesity is entering a new era.

For the first time, medicines exist that reliably produce levels of weight reduction and broader health benefits that decades of previous treatment could not. Diagnostic frameworks are being rewritten, policy attention is rising, and health systems are being forced to decide what they will fund, and for whom. What is striking about this moment is that its hardest problems are no longer mainly scientific. They now belong to health systems and policy, to access and economics, to implementation and the wider ecosystem in which obesity is defined, treated and paid for. That is the argument running through this series. The science has moved faster than the systems meant to deliver it, and closing that gap has become the defining task.

These six pieces belong together because they follow a single thread. Each takes a question that once looked purely scientific and reveals obstacles that are instead institutional, political and economic. Together they describe an era in which progress depends less on what we know than on how we choose to act on it, and on who gets to decide. What follows explores six of those questions.

Part One asks what we measure, and why a nineteenth century population statistic still decides who counts as having obesity at all. Part Two turns to what we can access, and whether treatments this effective will reach the people who need them or only those who can pay. Part Three looks at what drives the condition, and why the environments and industries that shape our diets have stayed so far beyond the reach of policy. Part Four considers who we treat, and how stigma and silence have kept so much of the patient's own experience outside the frameworks meant to capture it. Part Five examines what we automate, and whether the belief that obesity is an information problem has pointed technology at the wrong thing. Part Six asks what we inherit, and why the double burden of malnutrition, understood for twenty years, has been allowed to worsen throughout.

What makes these questions urgent is that the answers are still open. The convergence of effective treatment, evolving diagnosis and rising political attention has created a chance to rethink obesity more fundamentally than at any point in a generation, and that opening will not last indefinitely. This series is written for everyone with a stake in what happens next, from clinicians and health systems to policymakers, researchers and industry, in the belief that no single actor holds the whole problem and that the choices made now will shape obesity care for decades. Moments like this, when the science, the evidence and the appetite for change briefly align, are rare and easily lost. *The chapters that follow are where the rethinking begins.*

01

What do we measure?

Rethinking the metric at the heart of obesity care — and why a nineteenth-century population statistic still decides who counts.

Almost every estimate of the scale of obesity depends on a single measurement. The World Obesity Federation projects that around 1.13 billion adults will be living with obesity by 2030, a figure derived almost entirely from body mass index — weight in kilograms divided by the square of height in metres. BMI determines who is classified as having obesity, who meets the threshold for treatment, and how the results of that treatment are assessed. It is also a measure whose limitations are increasingly acknowledged within the field.

BMI was not developed for these purposes. The index was formulated in the 1830s by the Belgian mathematician and statistician Adolphe Quetelet as a means of describing the distribution of weight across populations rather than of assessing individuals. The term "body mass index" was introduced in 1972 by Ancel Keys and colleagues, who evaluated it against other weight-for-height indices and recommended it principally on the grounds of simplicity and suitability for epidemiological work. Its subsequent use as an individual diagnostic threshold reflects administrative convenience rather than physiological rationale.

The consequences are well characterised: BMI does not differentiate lean mass from fat mass, provides no information on the distribution of adipose tissue, and correlates only imperfectly with health risk at the individual level. It can therefore overestimate risk in some individuals and fail to identify it in others, including those with visceral adiposity and a BMI within the normal range.

> Its use as an individual diagnostic threshold reflects administrative convenience rather than physiological rationale.

BMI has nonetheless remained central to clinical and public health practice, in large part because so much of the surrounding infrastructure is built around it. Reimbursement criteria, eligibility for clinical trials, guideline definitions and national surveillance systems are all expressed in terms of BMI categories. These same properties make it difficult to displace, since any alternative must be reconciled with several decades of accumulated data and with the administrative systems that depend on it.

Two recent initiatives have sought to move diagnosis beyond BMI alone. In 2024 the European Association for the Study of Obesity proposed a framework that characterises obesity as an adiposity-based chronic disease and recommends that waist circumference or waist-to-height ratio be assessed alongside BMI. In January 2025 a Commission convened by The Lancet Diabetes & Endocrinology, comprising 58 experts and endorsed by 76 organisations, recommended that BMI be used only as a surrogate measure at the population level, distinguishing "clinical obesity" — in which excess adiposity already impairs organ function — from "preclinical obesity".

This distinction has direct implications for how the objectives of treatment are defined. Where obesity is characterised by body weight, the principal measure of success is weight reduction. Where it is characterised by the effect of adiposity on health, the relevant outcomes are the preservation of organ function and the prevention or management of complications.

Clinical trial evidence has begun to support this broader definition. In the SELECT trial, which enrolled 17,604 adults with overweight or obesity and established cardiovascular disease but without diabetes, semaglutide reduced major adverse cardiovascular events by approximately 20% over a mean follow-up of around three years. This benefit was not closely correlated with the degree of weight loss achieved, which suggests that the clinical value of such therapies is not fully captured by change in body weight.

None of this renders BMI redundant. As a population-level instrument it remains inexpensive, reproducible and comparable over time. The limitation lies in the mismatch between what BMI measures and the clinical questions increasingly asked of it. Addressing that mismatch is principally a matter of implementation rather than of science: it will depend on payers, regulators, trial sponsors and health systems that continue to rely on BMI downstream. For those working across this system, evidence framed solely in terms of weight change is likely to become less adequate as diagnostic definitions evolve.

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02

What can we access?

The economics of obesity treatment — whether treatments this effective will reach the people who need them, or only those who can pay.

For most of its history, obesity has been managed with interventions of limited durable efficacy. The introduction of glucagon-like peptide-1 (GLP-1) receptor agonists, and of dual agonists acting on related pathways, has altered that position, with clinical trials reporting degrees of weight reduction — and in some populations cardiovascular and other benefits — not previously achievable with pharmacotherapy. As a result, the central question is increasingly not whether these medicines are effective, but who will be able to obtain them.

The list prices of these medicines are high. In the United States, branded anti-obesity agents such as tirzepatide carry list prices of approximately US$1,000 for a month's supply, and injectable semaglutide has been estimated at several thousand dollars per person per year. Because obesity is highly prevalent, even a moderate per-patient cost produces a large aggregate liability, which is one reason few health systems have been able to fund unrestricted access.

These prices are not closely related to the cost of manufacture. An economic evaluation in JAMA Network Open in 2024 estimated that GLP-1 receptor agonists could be produced and sold at a profit for between approximately US$0.75 and US$72 per month — substantially below current market prices — and concluded that generic and biosimilar competition could reduce prices considerably.

> The evidence that the medicines work is now more developed than the mechanisms for making them available.

Access is constrained even where treatment is publicly funded. In England, the National Institute for Health and Care Excellence recommended tirzepatide for obesity, but NHS England set out a phased introduction over a maximum of twelve years, beginning with those at greatest clinical need — approximately 220,000 people in the first three years — and restricting initial eligibility to a body mass index above 35 with at least one weight-related complication. Explicit, prioritised rationing of this kind is likely to become more common as eligible populations are defined.

The distribution of the condition compounds the problem. The prevalence of obesity is rising most rapidly in low- and middle-income countries, where health budgets are smallest and out-of-pocket spending is highest. Medicines priced for high-income markets are effectively unavailable in these settings, so that the populations in which the burden is increasing fastest are also those with least access to treatment.

The addition of GLP-1 receptor agonists to the World Health Organization's Model List of Essential Medicines in September 2025, and the WHO guideline on their use in obesity issued in December 2025, indicate a shift toward treating access as a matter of policy rather than of commerce alone. Listing, however, does not by itself resolve price or supply.

A further question is how expenditure on pharmacotherapy relates to investment in prevention. Treatment and prevention address different populations at different stages and are not substitutes: pharmacotherapy manages established disease, whereas prevention reduces the number of people who develop it. Most health systems have not yet made the allocation between the two explicit.

The efficacy of these medicines has, in effect, changed obesity from a condition with few effective treatments into one whose management is limited principally by cost and delivery. That is a different category of problem — addressed through pricing, procurement, generic competition and decisions about eligibility and prioritisation rather than through clinical evidence alone.

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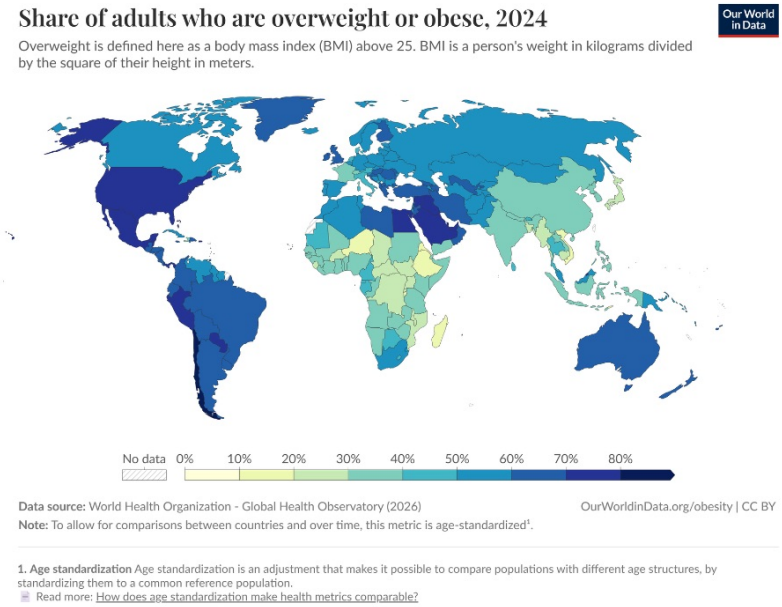
03

What drives it?

The commercial and political economy of obesity — why the environments and industries that shape our diets have stayed beyond the reach of policy.



Explanations of the rise in obesity have often centred on individual behaviour, with diet and physical activity treated primarily as matters of personal choice. This framing has directed policy toward information and education. It accounts less well for the speed and consistency of the global increase, which has occurred across very different cultures and income levels within a few decades — more rapidly than any plausible change in individual biology.

The commercial determinants of health describe the ways in which the products and practices of the private sector affect population health. The first paper in a 2023 Lancet series observed that four industry sectors — tobacco, ultra-processed food, fossil fuels and alcohol — together account for at least a third of global deaths. Applied to obesity, this framing directs attention to the food environment: the availability, pricing, composition and marketing of energy-dense, ultra-processed products.

Ultra-processed foods are a particular focus. A considerable body of observational evidence associates higher consumption with weight gain and metabolic disease, although the mechanisms and extent of causation remain under investigation. The resulting policy question is whether the composition and marketing of the food supply should be regarded as a determinant of health amenable to regulation, in the manner of tobacco, rather than as a matter left entirely to consumer choice.

> The binding constraint is frequently political rather than technical.

Several middle-income countries have tested such measures, and Latin America provides the clearest evidence. Mexico introduced a tax on sugar-sweetened beverages and on non-essential energy-dense foods in 2014. An analysis published in JAMA Network Open in 2023 found that the contribution of taxed items to dietary intake declined after implementation and that the added-sugar content of the overall diet decreased, while purchases of some untaxed unhealthy items rose. The findings indicate both that fiscal measures can shift consumption and that their effects are partial.

Chile adopted a broader approach. Its 2016 Law of Food Labelling and Advertising was the first national regulation to combine mandatory front-of-package warning labels, restrictions on child-directed marketing, and a prohibition on the sale of products high in nutrients of concern in schools. An evaluation published in PLOS Medicine in 2020 found that purchases of high-in beverages fell by approximately 24% relative to the expected trend — a larger reduction than stand-alone taxes achieved elsewhere in the region.

These policies are informative not only for their measured effects but for the resistance they encountered. Each was contested by the affected industries through legal challenge, lobbying and disputes over the evidence, and each depended on sustained political commitment. The literature emphasises that the principal obstacle is usually not the absence of workable policy but the imbalance of power and interest that impedes implementation.

Understanding obesity as partly a product of the commercial and regulatory environment does not remove individual agency, but it changes where the levers of policy are understood to lie. For health systems facing rising obesity-related disease, clinical treatment and environmental regulation address different points in the same causal chain, and neither is sufficient alone.

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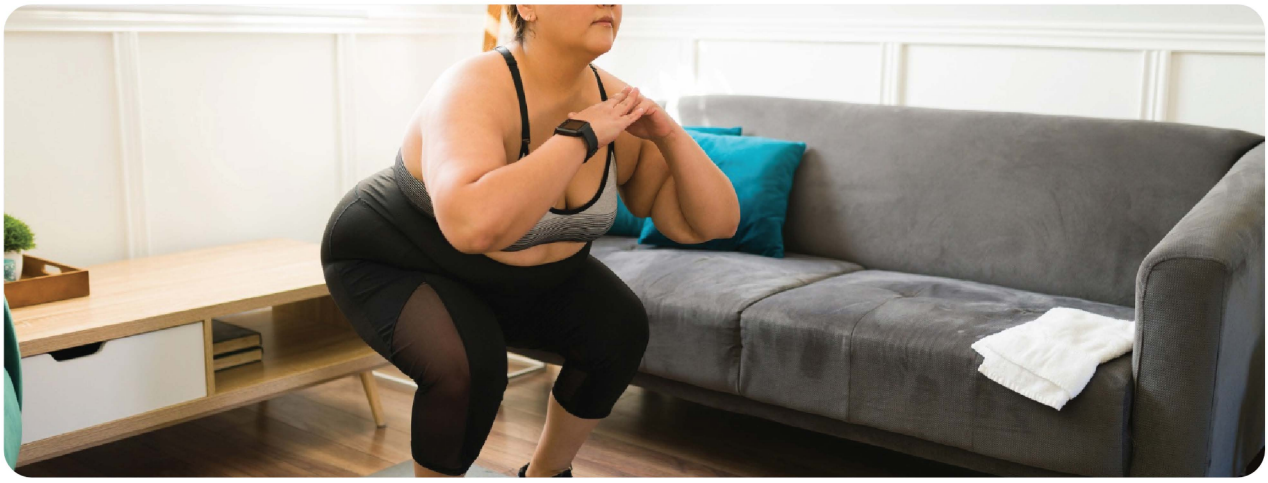
04

Who do we treat?

Stigma, lived experience and the limits of measurement — how so much of the patient's own experience has stayed outside the frameworks meant to capture it.



Obesity is unusual among chronic conditions in the degree to which those affected are held responsible for it. The belief that obesity results from personal failings of diet and discipline is widespread — including among health professionals — and it has consequences for how people are treated in clinical and social settings. This dimension is not captured by any physiological measure, yet it affects both the experience of the condition and the outcomes of its treatment.

The evidence on weight stigma is substantial. A joint international consensus statement published in Nature Medicine in 2020, developed through a formal consensus process and endorsed by numerous organisations, concluded that people with obesity commonly encounter discrimination in employment, education and healthcare; that weight stigma causes measurable physical and psychological harm; and that stigmatised individuals are less likely to receive adequate care.

The clinical setting is a particular concern. Weight bias among clinicians is well documented and can affect the quality of the encounter, including communication and the extent to which patients trust and engage with care. Where patients anticipate blame, they may defer or avoid medical contact, so that stigma contributes to the under-treatment it is often assumed merely to accompany.

> So much of the patient's own experience has been kept outside the frameworks meant to capture it.

Stigma also shapes what is measured. The subjective experience of living with obesity has historically received limited systematic attention. "Food noise" — heightened or persistent food cue reactivity that produces intrusive thoughts about food and can disrupt daily life — emerged largely from patient accounts, and has begun to be defined and measured formally only in the past few years, prompted in part by reports that GLP-1 medicines reduce it. That a phenomenon central to many patients' experience was, until recently, largely absent from clinical assessment illustrates how much of the condition has fallen outside conventional measurement.

The broader point is that outcomes which matter to patients — quality of life, day-to-day functioning, and the mental burden of the condition — have been captured inconsistently in research and practice. The inclusion of psychological health and quality of life in the 2024 EASO framework, and the participation of people with lived experience in the 2025 Lancet Commission on clinical obesity, reflect a recognition that these dimensions belong within the clinical account rather than outside it.

This has increased interest in involving patients more directly in the design of care and research, an approach often described as co-production. The rationale is both ethical and practical: services and evidence reflecting what patients actually experience are more likely to be used and to be effective. Whether co-production improves outcomes at scale is not yet established, but it follows from the evidence that the patient's experience is itself a determinant of results.

Considered together, stigma, the neglect of subjective experience, and the limited involvement of patients point to a single underlying issue: important aspects of obesity have fallen outside the frameworks used to define, measure and treat it. Correcting this requires changes in clinical culture and language, in what is measured, and in who participates in decisions.

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05

What do we automate?

Myths and realities of digital health and AI — whether the belief that obesity is an information problem has pointed technology at the wrong thing.

Few areas attract as much projection as the meeting of technology and obesity. Each wave of digital innovation — the calorie-counting application, the step tracker, the continuous glucose monitor, and now generative artificial intelligence — has arrived with a similar implicit promise: that measurement and feedback will succeed where willpower is said to have failed. The belief underlying them is rarely stated plainly: that people carrying excess weight are, at root, short of information, and that supplying more of it will change what they do.

The most instructive evidence on that assumption is counterintuitive. In the IDEA randomised trial, reported in JAMA in 2016, young adults following a standard behavioural weight-loss programme were divided between those who continued alone and those given a wearable activity device in addition. After two years, the group with the device had lost less weight, not more — an average of 3.5 kg against 5.9 kg. Feedback can distract, reassure prematurely, or become an activity that substitutes for the change it was meant to support.

Personalisation invites the same scrutiny. A landmark 2015 study in Cell used continuous glucose monitoring of an 800-person cohort to show that people respond very differently to the same meal. But the leap to the marketed promise of "precision nutrition" is considerable: the study concerned short-term glucose responses, not weight or long-term obesity outcomes.

> The single largest advance in obesity treatment in a generation did not come from an algorithm. It came from decades of incretin physiology.

There are areas where artificial intelligence contributes substantively: estimating body composition from imaging, stratifying risk, easing administrative burden, and assisting the earliest stages of drug discovery. Yet the most consequential recent progress in the field — the GLP-1 receptor agonists — has been biological and pharmacological, not computational, which sits awkwardly against the prevailing narrative that artificial intelligence is transforming obesity care.

The technologies also carry risks that fall unevenly. Artificial-intelligence systems reflect the data on which they are trained. The World Health Organization's 2024 guidance on large multi-modal models warns of biased or inaccurate outputs, and of "automation bias" — the tendency to defer to a machine's judgement even when it is wrong. Models trained predominantly on high-income populations may not generalise to the settings where obesity is now rising most quickly.

A deeper question is what continuous quantification does to the person subject to it. The same tools that promise control also intensify self-surveillance, and for some people the constant monitoring of food, weight and activity may feed the intrusive preoccupation patients describe as food noise. When eating is turned into a continuous stream of information, that information has commercial value, and the individual is not always its principal beneficiary.

Underlying most of these myths is a single premise — that obesity is fundamentally an information problem. Two decades of evidence suggest the binding constraints are seldom informational: what dominates are biology, environment, access and cost. The useful question is not whether digital health will change obesity care, but whether it will be pointed at the parts of the problem that matter, or at the parts that are easiest to measure and to monetise.

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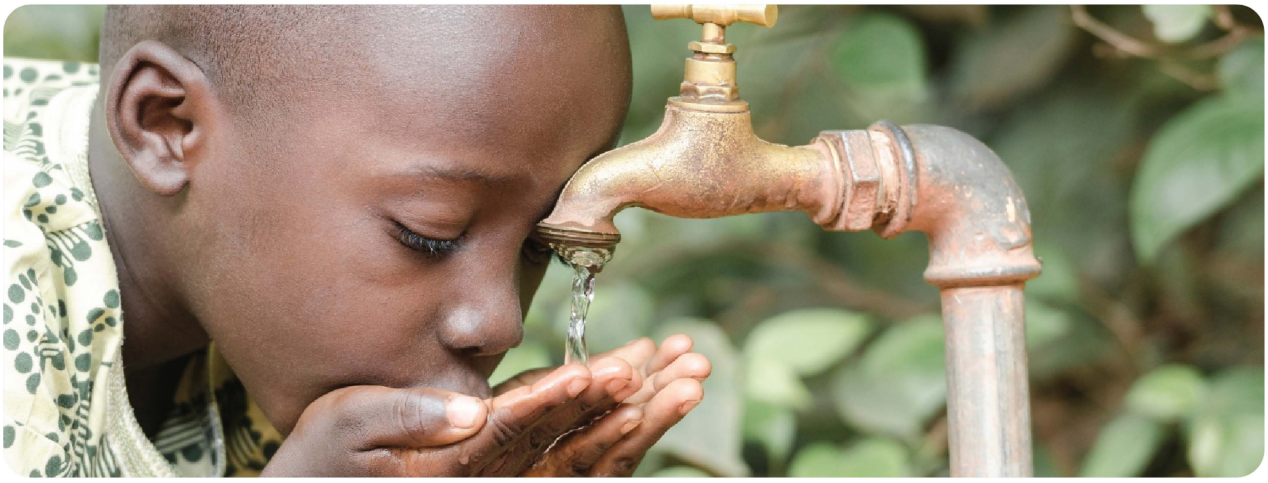
06

What do we inherit?

Why the double burden of malnutrition, understood for twenty years, has been allowed to worsen throughout.



The coexistence of obesity and undernutrition is not a recent discovery. The double burden of malnutrition — the simultaneous presence of undernutrition and overweight within the same countries, communities and often the same households — has been named and studied for the better part of two decades. Its drivers have been documented, its trajectory forecast, and by 2020 a set of policy responses had been formally proposed. It has nonetheless continued to worsen.

The direction of travel is not in dispute. A 2020 analysis in The Lancet found that the double burden had grown even in the poorest low- and middle-income countries, driven mainly by rising overweight rather than by any resolution of undernutrition. A pooled analysis of 3,663 studies covering 222 million people, published in 2024, found that among school-aged children and adolescents obesity had, by 2022, become more common than thinness in most countries, while thinness persisted in parts of South Asia and Africa.

There is a generational dimension that raises the stakes of delay. Nutrition in early life, including before birth, shapes metabolic regulation and later disease risk. A child who experiences deprivation and is then exposed to an obesogenic environment may carry a compounded susceptibility, so that each period of double burden helps to seed the next. Inaction does not hold the problem steady; it transmits it forward.

> A problem understood but not owned, with a remedy available but not adopted.

Part of the explanation for the persistence is institutional. Actions against different forms of malnutrition have historically been managed by separate communities, with distinct policies, programmes, governance structures and funding streams, and the two fields have often competed for the same limited nutrition resources rather than combining them. The proposed remedy — the "double-duty actions" set out in the 2020 Lancet series — has existed for years, yet it requires precisely the integration that established structures are configured to resist.

A more uncomfortable finding is that some interventions appear to have made matters worse. There is evidence that programmes focused solely on undernutrition have, in settings undergoing rapid dietary change, raised the risk of poor-quality diets and obesity. Beneath much of this lay a framing that treated obesity as a disease of affluence, and therefore not a priority for low-income countries or their donors.

The deeper reason may be that the principal driver has continued to accelerate. The spread of inexpensive ultra-processed food, changes in retail and marketing, and reductions in physical activity have transformed diets across low- and middle-income countries faster than regulation has adapted. Two recent developments threaten to widen the gap: highly effective obesity medicines, which risk concentrating attention and resources on those able to pay, and the contraction of development assistance, which falls most heavily on the undernutrition programmes serving the poorest.

If the problem is not principally one of knowledge, neither is its solution. The evidence has long indicated that the double burden yields only to measures acting on its shared causes — the quality, price and marketing of the food supply — applied consistently and early. Its persistence over two decades is less a scientific failure than an institutional and political one. If it has been understood for twenty years and has worsened throughout, the question is what specifically would have to change for the next twenty to be different.

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ABOUT SPEYSIDE

Where global strategy meets local reality

This series reflects the questions Speyside works on every day. Speyside Healthcare is a senior-led strategic advisory firm specialising in medical affairs, government and public affairs, with two decades of experience delivering high-impact work across APAC, EMEA and LATAM. Its vision is to be the strategic partner of choice for healthcare organisations operating in complex international environments, bringing strategic intelligence to local execution through bespoke, integrated solutions built for lasting impact.

What sets the practice apart is how it is built. Government, public and medical affairs sit under a single practice lead, with one strategic thread connecting every milestone across the product lifecycle, while an extended network of vetted in-market consultants and experts across more than forty countries grounds each recommendation in local reality. The result is global strategy that is pressure-tested against regional drivers and delivered through lasting relationships in market, rather than rolled out through one-off engagements.

The work is organised around four integrated capabilities. Medical Affairs connects scientific evidence to locally relevant medical narratives and stakeholder engagement. Policy, Regulatory and Government Affairs navigates political landscapes, from regulatory mapping to ministry-level engagement and coalition building. Communications and Strategic Positioning builds locally credible narratives that shift perception and awareness. Market Access and Commercial Strategy positions products for reimbursement through HTA strategy, payer engagement and evidence planning.

Throughout, the emphasis is on measurable impact rather than activity — tracking not simply how many stakeholders are reached but whether decisions, guidelines and access actually change. These are precisely the questions of access, policy and implementation that this series has explored, and they are the questions Speyside exists to help its partners answer.

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Moments like this, when the science, the evidence and the appetite for change briefly align, are rare and easily lost.

The chapters here are where the rethinking begins — an invitation to everyone with a stake in what happens next.