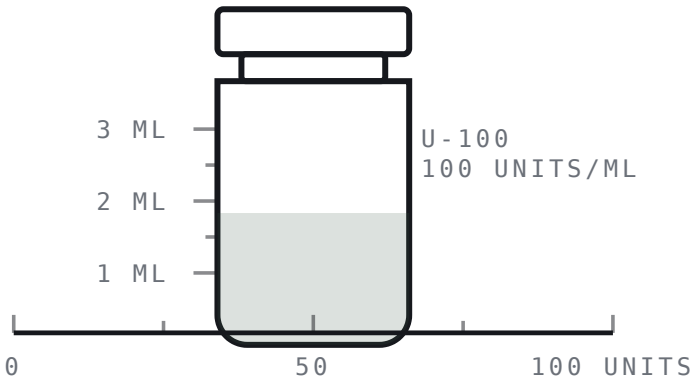
The Compound Chronicle *Playbook*

What we wish we knew before we started. What to take, where to buy it, the gear that works, how to mix and measure it, and how to keep it good — without the expensive mistakes.



BADGE	How good the evidence is, before anything else on the card.
CHIP	Whether a schedule came from a trial or from people doing it.
BAR LENGTH	How much liquid one milligram fills. Short bar, less room for error.

IN THIS EDITION · ELEVEN COMPOUNDS

- 1 approved
- 3 approved abroad
- 4 with human trials
- 3 animal or lab only

7 SECTIONS ~15 MIN READ PLAIN ENGLISH UPDATED 30 OCTOBER 2026

START READING DOWNLOAD PDF

01 What to take
02 The compounds
03 Where to buy
04 Gear

05 Mix and measure
06 Store it
07 Tools

00 SIXTY SECONDS

Read this first

This is the bench half of the hobby: what to buy, what to trust, how to mix it, how to measure it, and how to keep it from going off.

It is written for laboratory research, and everything in it assumes that.

- **It is not medical advice.** Nobody here is your doctor, and nothing on this page is a recommendation to put anything into a person.
- **Nothing here is approved for human use.** That is true of almost everything in this market, including the things with good trials behind them.
- **The paperwork is your only protection.** A certificate that names your batch is worth more than any amount of marketing.
- **Laws differ where you live.** That part is on you, and it is worth ten minutes before you spend any money.

01 GROUPED BY WHAT PEOPLE USE THEM FOR

What to take

Parts of this shelf have huge trials behind them. Parts have none. Both get sold with the same confident copy — so the badge comes first.

Approved

A regulator approved it for something specific. Not the

Approved abroad

Legal in some countries, often for years. Different rules, older

Large human trials

Big randomised studies. The strongest thing short of an

same as approved for what you are doing.

paperwork.

approval.

- **Animal and lab studies**

  Works in mice or in a dish. Nobody has proven it in people.

Weight and metabolism

LARGE HUMAN TRIALS

Retatrutide

One shot a week that pulls three switches at once: GLP-1, GIP and glucagon. The third one tells the liver to burn stored fat. Not approved.

LARGE HUMAN TRIALS

Cagrilintide

A long-acting copy of amylin, the fullness signal that arrives with insulin. Different route than the GLP-1s, so the two add up instead of doubling.

Repair, skin and gut

ANIMAL AND LAB STUDIES

KLOW

Four repair compounds in one vial. One vial, four jobs: skin and collagen, tendon and gut. Nobody has studied the four together.

MOSTLY LAB STUDIES

GHK-Cu

A copper peptide your body makes. The best human data comes from skin creams, not from vials.

Growth hormone

APPROVED

Tesamorelin

Tells the brain to release more of your own growth hormone. Approved as Egrifta for a specific group. Visceral fat fell about 15% in 26 weeks.

SMALL HUMAN DATA

Ipamorelin + CJC-1295

The popular pair. One presses the ghrelin switch, one the GHRH switch. Cleaner than the old peptides in this class. No trial of the pair.

Energy and mitochondria

ANIMAL AND LAB STUDIES

MOTS-c

A 16-amino-acid peptide your mitochondria make. It goes up about twelve-fold when you cycle. Human trials of the peptide itself: zero.

MIXED

NAD+

Not a peptide — the fuel molecule itself. Human work exists, mostly small and mostly looking at levels rather than outcomes.

Brain and immune

APPROVED IN RUSSIA

Semax

An ACTH fragment sold as a nasal drop. Raises BDNF in animals. The human studies are small and Russian.

APPROVED IN RUSSIA

Selank

A tuftsin copy approved in Russia for anxiety since 2009. One 62-person trial matched a prescription drug. No placebo trials.

APPROVED ABROAD

Thymosin alpha-1

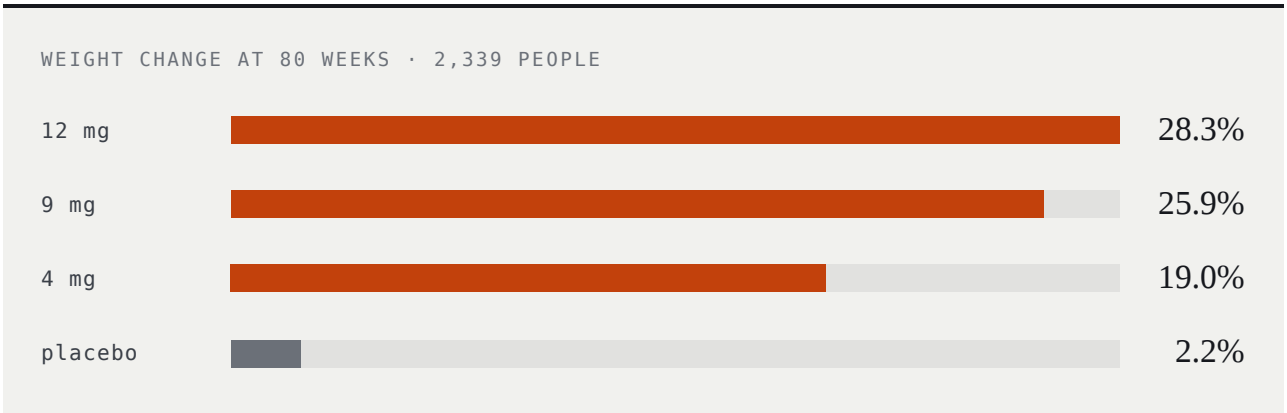
A thymus peptide approved in about 35 countries. Its biggest trial, 1,106 patients, found no survival benefit.

02 THE FOUR PEOPLE ASK ABOUT MOST

The compounds, up close

Retatrutide

One shot a week. It pulls three receptors at once — GLP-1, GIP and glucagon. The third one is the new part: it tells the liver to burn stored fat, which is why the liver results are the ones that made people sit up.



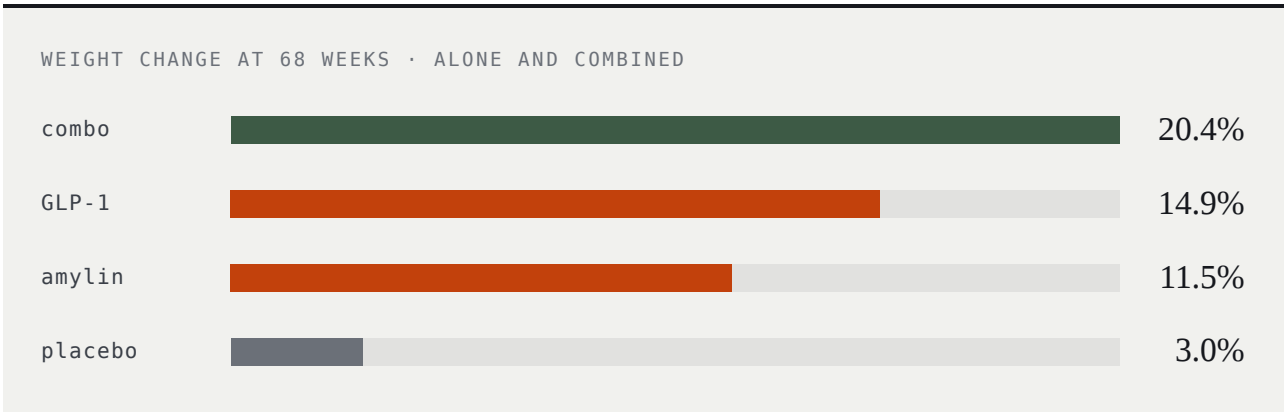
How it went in the trial: nausea in 29%, 38% and 42% of the three groups against 15% on placebo. Four, seven and eleven people in a hundred stopped because of side effects. The trial amounts were 4, 9 and 12 mg, and the company has signalled a filing in early 2027 — so anything sold today is outside any approval.

If you only remember one thing: the difference between 4 mg and 12 mg here is nine percentage points, and the stomach trouble doubles with it.

Cagrilintide

A long-acting copy of amylin — the fullness signal that arrives alongside insulin. It works a different route from the GLP-1s, which is why the two

stack instead of doubling up.



People who stayed on the combination the whole way through did better still: 22.7%, and four in ten of them lost a quarter of their starting weight. Stomach trouble hit 80% on the combination against 74% on the single drug, mostly mild. It was filed at the end of 2025, with a decision expected by the end of 2026.

KLOW — the four-in-one

Instead of four vials, one vial at a fixed 5:1:1:1 ratio. On an 80 mg vial that means 50 mg of the copper peptide and 10 mg each of the three repair peptides. One vial, four jobs.



The copper one has the best human data of the four, and it comes from skin creams rather than vials. BPC-157 has a mountain of animal work and only small human reports — and it is banned in tested sport. TB-500 has never been through a human trial. KPV calmed colitis in mice; a US advisory panel looked at it in July 2026 and decided nothing. Nobody has studied all four together.

Growth-hormone secretagogues

These do not contain growth hormone. They tell your pituitary to release more of your own, which then raises IGF-1. Softer than the real thing, and a different animal.

1.4 mg	~15%	37%	0

TESAMORELIN, PER DAY, LABELLED | VISCERAL FAT, 26 WEEKS | LIVER FAT, 1 YEAR | TRIALS OF THE POPULAR PAIR

Tesamorelin is the one with a real approval (Egrifta), and the paperwork is strict about it — no active cancer, no pituitary problems, no pregnancy, and IGF-1 gets checked. Ipamorelin is the popular clean one: it does not push cortisol and prolactin up the way the older peptides in this class do. CJC-1295 without DAC is the short-acting partner; the DAC version hangs around for about a week instead. The pair is something people do, not something anyone trialled.

MOTS-c

A sixteen-amino-acid peptide your mitochondria make. It switches on AMPK, the cell's energy sensor, and your levels go up about twelve-fold when you cycle.

12×	0	~20	7–5
AFTER A BIKE RIDE	HUMAN TRIALS OF THE PEPTIDE	PEOPLE IN THE ANALOGUE TRIAL	ADVISORY VOTE, JULY 2026

The mouse work is striking: leaner animals, better insulin response, older mice nearly doubling their treadmill distance. The human work is one small trial of a modified version — liver enzymes and blood sugar came down, liver fat did not beat placebo, and the company stopped. No trial has given the peptide itself to people.

The brain and immune ones

All three are legal somewhere else and not here. Semax and Selank are Russian nasal drops; the thymus peptide is approved in about 35 countries. The human studies behind each are small, old, and thin — and the biggest of them is a failure.

Sources are listed on each compound's entry in the chronicle. Everything above is reported as published, and the amounts are the ones the trials used.

03 THE BIT NOBODY EXPLAINS

Where to buy

The "research use only" label is what lets a seller ship without a pharmacy licence. Which makes the paperwork the only thing standing between you and a vial of nothing in particular.

VETTING A SELLER IN TWO MINUTES

- ☐ **A certificate that names the batch** — not just the compound.
- ☐ **Lot numbers that match** across the vial, the box and the certificate.
- ☐ **A way to check it** — a lookup page or QR that reaches the lab. Search the public corpus at CertIQX first.
- ☐ **Pay by card.** A card can be disputed. A transfer cannot.
- ☐ **Buying ten?** Have one tested before you touch the other nine.

What sellers call things

Many do not print the real name. The codes below are what shows up instead — and two of them are actively misleading, so read the certificate rather than the label.

COMPOUND	WHAT IT GETS CALLED
Retatrutide	GLP-3, GLP-3 RT, RT, Reta, 3RT
Retatrutide + cagrilintide	GLP-5
Tirzepatide	GLP-2 TZ, GLP-2 T, TZ, Tirz
Semaglutide	GLP-1 S, GLP-1 SG, SG, Sema
Cagrilintide	GLP-1 C, Cagri
Tesamorelin	Tesa
Ipamorelin	Ipa
CJC-1295 (no DAC)	CJC, Mod GRF 1-29
BPC-157	BPC
TB-500	TB, TB4
GHK-Cu	GHK, copper peptide
GHK-Cu + BPC-157 + TB-500	GLOW
GHK-Cu + BPC-157 + TB-500 + KPV	KLOW
MOTS-c	MOTS-c, MOTSc

"GLP-2" and "GLP-3" are not hormones. They are shorthand for compounds that hit two or three receptors — and GLP-2 is a real, different thing that those compounds do not touch. "Triple G" gets used for more than one drug. Codes also change every few months.

04 BUY ONCE, BADLY, OR ONCE PROPERLY

Gear

Three things decide whether a mix comes out right: the syringe can move the volume in one pull, the needle does not chew rubber into the vial, and the measurement is readable at the size you need. Everything else is consumable.

SIMPLEST about $14–18 for 50

3 mL Luer-lock syringe with a 25G × 5/8″ needle

A whole vial or cartridge is 3 mL, so one draw moves all of it, and the needle twists off when you want a thinner one.

GOOD One sealed package. Fewest things to touch.

WATCH Thicker needle. Rough on small rubber tops, and too thick to fit twice in one cartridge top.

GENTLEST about $16 + $9 for 100

3 mL Luer-lock syringes + 30G × ½″ needles, separately

The thin needle is easy on tiny vials and small rubber tops, and you can swap needles between the water and the compound.

GOOD Thin and short. Bends less rubber into the solution.

WATCH You attach the needle yourself, and thin needles bend if you push at an angle.

FOR MEASURING about $17–33 for 90–100

1 mL U-100 syringes, 31G × 5/16″

One hundred units to a millilitre, so the smallest line you can read is 0.01 mL. This is the one that decides your amount.

GOOD Fine enough to read small volumes. Thin needle.

WATCH Bends in rubber tops — do not use these to mix. Buy a known brand.

NON-NEGOTIABLE about $10 for 400

70% isopropyl pads

Every rubber top, every time, before and after. Individually wrapped so they are wet when you need them.

GOOD Cheap, and the single biggest contamination win.

WATCH Wet alcohol carried into a vial ruins it — let it air-dry about 30 seconds.

IF YOU REPEAT A VOLUME about $65–80

Reusable pen, 3 mL cartridge

Dial the amount, press, done. Steadier than drawing by hand when the same volume goes in week after week.

GOOD Same volume every time. Faster once you know your number.

WATCH Unbranded V1/V2/V3 units are junk — they reset by pulling the plunger back by hand. Buy a boxed one.

FOR PENS ONLY about $10–18 for 100

Pen needles, 32–33G × 4 mm

Higher gauge means a thinner needle. On daily use that is the difference between a routine and a chore.

GOOD Thin, short, and cheap enough to never reuse.

WATCH Only fits a pen. Keep them out of your mixing kit so you do not mix the two up.

WITH THE PEN about $16 for 40

3 mL pen cartridges, sterile

Sealed, sterile, the same volume as a vial but longer and narrower. Air needs a way out when you fill one.

GOOD A clean container for the pen, one per fill.

WATCH An opened cartridge is not sterile. Fill it with an escape needle, never from the back.

BEFORE THE FIRST NEEDLE about $5, or free

Sharps container

Rigid, closable, labelled. Needles go in point-first and the lid stays on.

GOOD A thick screw-top bottle works if it is genuinely thick.

WATCH A water bottle gets poked through. Replace at three-quarters full, never the bin.

Prices are typical, move around, and are worth checking before you order. Nothing here is a paid link.

05 EIGHT STEPS, THEN THE SUMS

Mix and measure

Work on a clean surface, go slowly, and never touch the needle or a rubber top once you have wiped it. Eight steps — and most ruined vials are ruined in three of them.

01

Warm up and wipe

Let the vial and the water reach room temperature. Cold powder dissolves slowly, and slow dissolving is what tempts you to shake. Wipe both tops with alcohol and let them dry.

02

Push air in

Vial flat on the table: push in as much air as the water you are about to draw. Without it the vial pulls a vacuum and fights you.

03

Flip and draw

Turn the water vial over, keep the tip under the surface, and pull to your volume.

04

Go in at 45°, bevel up

Slanted tip up, through the rubber, then straighten. That one habit roughly halves the rubber you shave off into the vial.

05

Run it down the glass

Tilt the vial and aim at the inside wall. Push slowly. A hard squirt straight onto the powder foams it, and foam is compound you cannot get back.

06

Swirl, never shake

Roll it between your fingers until it is clear. Still cloudy? Wait a few minutes and swirl again. Shaking does not help; it breaks things.

07

Draw your volume

Flip the vial, keep the tip in the liquid, pull to your units, tap the bubbles out, and check the line twice.

08

Label it

Compound, water added, strength, date. An unlabelled vial is an unknown substance, and it has to be treated like one.

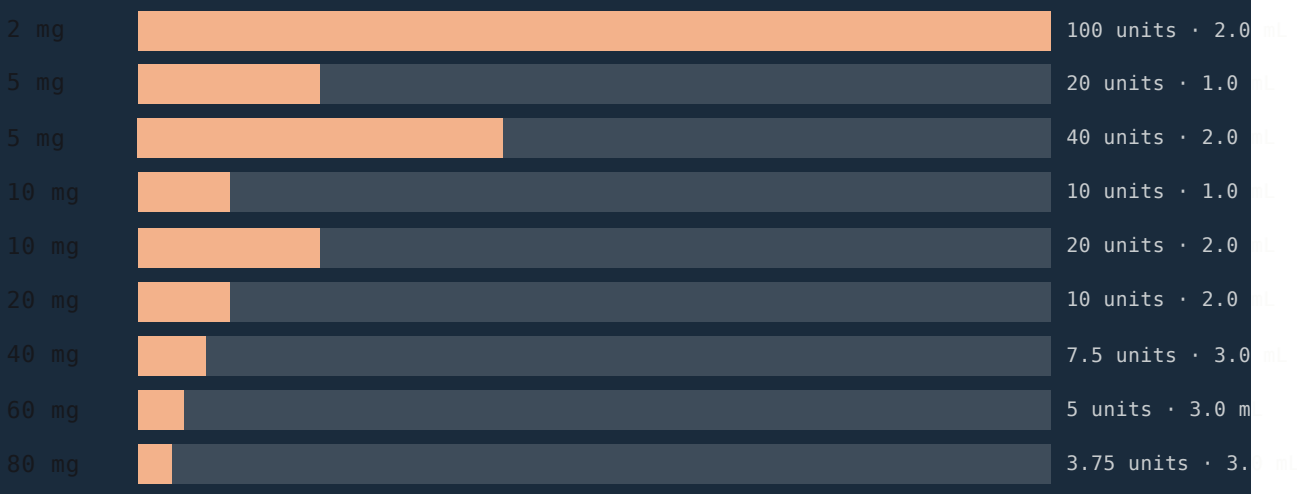
05B THE ONLY SUMS YOU NEED

The maths

Two lines cover it, and one rule makes both easy.

STRENGTH	mg ÷ mL
UNITS TO DRAW	mL × 100

The easy rule is **1 mL of water for every 10 mg**. Every vial then lands at 10 mg/mL, one unit is 0.1 mg, and the draw is just the milligrams times ten. It stops working at the ends — under 1 mg the draw gets too small to read, over 30 mg the vial will not hold the water.



Longer bar, weaker mix, more liquid to draw and more room for error. Shorter bar, stronger mix — a small slip is a big one.

Anything not on the chart goes through the calculator first: vial, water, amount → the draw, with every step shown. Handy neighbours are the reference chart and the mixing matrix

How often

The chip matters more than the row. A trial schedule and something people do are not the same thing, and calling them both "the protocol" is how a habit gets dressed up as evidence.

Once a week

FROM TRIALS

AMOUNT	Start at the bottom of the published range. Step up no sooner than every four weeks.
ON / OFF	No set break — taper down instead of stopping cold.

Five days on, two off

FROM PRACTICE

AMOUNT	Fixed amount per draw, set by the protocol.
ON / OFF	8–12 weeks on, 4 weeks off.

Once a day, short course

FROM TRIALS

AMOUNT	Fixed amount per draw.
ON / OFF	2 weeks on, 1–3 weeks off.

Two or three times a week

FROM PRACTICE

AMOUNT	Fixed amount per draw, spread across the week.
ON / OFF	4–8 weeks on, 4 weeks off.

Twice a week

FROM PRACTICE

AMOUNT	Fixed amount per draw, 3–4 days apart.
ON / OFF	8–12 weeks on, about a month off.

- Start at the bottom of the range. You can always go up.
- One new thing at a time, two to four weeks apart, or you will never know what did what.

- Never two of the same class at once. Nobody has tested that, so the result means nothing.
- Breaks belong in the plan from day one, not in the reaction.

06 COLD, DARK, DRY, ONCE

Store it

Cold, dark, dry — and frozen exactly once.

Vials live in an insulated jar with a silicone insert, in the freezer. The jar is not decoration: it holds the temperature steady every time the door opens, and keeps light off the glass. Two jars stay frozen; one is the transfer jar for the fridge.

−20 °C −4 °F	2–8 °C 36–46 °F	20–25 °C 68–77 °F
Long term: the freezer A stand-alone freezer holds steady better than a kitchen one. In a kitchen freezer, keep the jars at the back, away from the door.	**In use: the fridge** Move things inside the freezer, not on the counter. Then take the transfer jar to the fridge and leave it there.	**Room temperature, briefly** Fine for letting a vial warm up before you open it. Not a place to keep anything — light and warmth are what shorten its life.

Two rules do most of the work. **Freeze once** — once it is in, it stays in, and only what you need moves to the fridge. And **never freeze a mix**: cold storage is for dry powder, and a mixed vial goes in the fridge and stays there.

Silicone inserts, not hard plastic — plastic cracks at freezer temperatures. Write the mix date on every vial: the water has its own clock once you open it, and the mix has a shorter one.

When to throw it out

Check before you mix, after you mix, and before every use. When in doubt, bin it — a new vial is cheaper than an experiment you have to throw away.

Before you mix — the powder

NORMAL

A dry white powder, or a solid puck. It can look shrunken or stuck to the glass and still be fine.

BIN IT

Yellow, brown or odd colour. Wet, sticky or clumped. A cracked vial, or a seal that is torn, loose or missing. A lot number that does not match the paperwork.

After you mix — the liquid

NORMAL

Clear, like water. Two exceptions: a copper peptide and a four-peptide blend are blue, which is normal.

BIN IT

Still cloudy after 15–20 minutes in the fridge and a gentle swirl. Floaters, specks, strings or grit. Colour that changes over days. Anything that gels or thickens.

Over time — the vial

NORMAL

Clear, still inside its window, kept cold and upright.

BIN IT

Past the window. Frozen after mixing. Left out warm for hours. Cloudy when it used to be clear. A needle or a rubber top that was touched or dropped.

YOUR SIX-POINT CHECK BEFORE THE FIRST DRAW

- ☐ Lot number on the vial matches the box and the certificate.
- ☐ The certificate names the batch and can be checked with the lab that issued it.
- ☐ The vial says what is in it, how much water went in, the strength and the date.
- ☐ The rubber top was wiped and left to dry.
- ☐ Water went down the glass, and the vial was swirled, not shaken.
- ☐ You know how much one unit of your mix is before you draw anything.

07 EVERYTHING ELSE IS ONE TAP AWAY

Tools, and passing it on

The calculator	VIAL, WATER, AMOUNT → UNITS
Reference chart	THE PUBLISHED ROWS
Mixing matrix	WHAT CAN SHARE A VIAL
CertIQX	CHECK A CERTIFICATE
The Field Guide	VERIFICATION, DEEPER

This is free and it stays free. If it saved you one wasted vial, pass the link on — that is the whole payment. If we got something wrong, tell the desk and the correction goes on the page rather than quietly disappearing.

human or animal use. Figures are reported as published; anything marked "from practice" has no controlled study behind it.