FIRSTBEAT

FIRSTBEAT SPORTS · QUICK GUIDE

Fitness Testing in Pre-Season: Week by Week

Six tests, six decisions before the first match



4 min read · Submaximal Fitness Test (SMFT) · Soccer · 2026

Before week 1

One Submaximal Fitness Test (SMFT) a week, inside the warm-up: a few minutes at one fixed speed. What the numbers mean is explained in our blog How to Test Fitness In-Season Without a Testing Day.

Set the protocol once

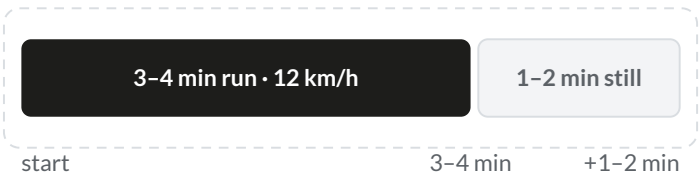
Firstbeat Sports Cloud › Reporting › Fitness Testing. Every later test reuses it

Pick the slot and keep it

Same day, same point in the warm-up, every week

Brief the players

Run at the defined, steady speed. Running faster than instructed spoils the result



HRex = Peak %HRmax (60 s), picked automatically

HRR = drop in 60 s

Lower HRex at the same speed = fitter.

Week 1 · Set the baseline

Do

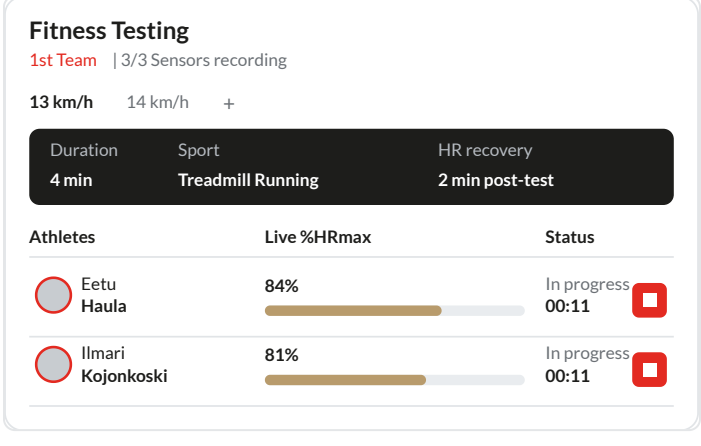
First SMFT, plus one maximal test (30-15 IFT, Yo-Yo or MAS) the same week

Look

Each player's starting level. Near 70% HRmax at 12 km/h is fit; near 90% or above is a low starting point

Decide

Nothing yet. Note who starts low and ask about their off-season



Weeks 2–3 · Is the work landing?

Do

Same day, same warm-up, same speed

Look

The squad average should come down. Whose result is flat or rising?

Decide

Flat or rising: check that player's load and QRT from the same week before changing anything

Team Summary

	Peak %HRmax (60s) 50% 100%	value	prev.	HR Recovery (60s, %) 10%	value	prev.
P. **Graven**		**88.6%**	-6.2%		**26%**	+3%
N. **Ekua**		**83.7%**	-6.7%		**21%**	+8%
D. **Novak**		**81.1%**	-3.0%		**18%**	-2%
M. **Cowl**		**78.9%**	-3.9%		**23%**	+3%
L. **Browne**		**78.7%**	-5.7%		**18%**	+7%
A. **Canuci**		**78.7%**	-4.8%		**35%**	+12%

Weeks 4–5 · Who is following slower?

Look

Curves start to level off. Who is still near their week 1 level? Late joiners and returning players follow their own track

Decide

Extra conditioning or a lighter load for individuals, based on the trend, not one test

Final week · Lock the in-season baseline

Do

The last pre-season test, same protocol. This result is the benchmark for the season

Decide

Who to discuss with the coaching staff before the first match: minutes, extra conditioning, a closer eye in the first weeks

> One result is a data point; the pre-season trend is the signal.

Into the season

Test at least every second week. Keep the day and warm-up consistent. MD-4 or MD-3 often work well, but consider the constraints of your own setting.

PRE-SEASON · ONCE A WEEK

Mon	Tue	Wed	Thu	Fri	Sat	Sun

Any day works: same day, same point in the session.

SEASON · EVERY SECOND WEEK

MD+1	MD+2	MD-4	MD-3	MD-2	MD-1	MATCH

Same day and warm-up each time. MD-4 or MD-3 often work.

Reading a result in 60 seconds

1 · Team Summary
pre-season: average falls; steady = coping; up = likely fatigue

2 · Player trend
each test against the athlete's own ±1 SD band

3 · Check the test
big change? Check the test was done right first

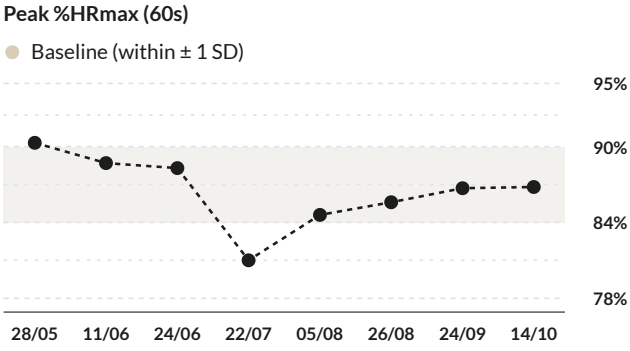
CHANGE IN %HRmax, TEST TO TEST

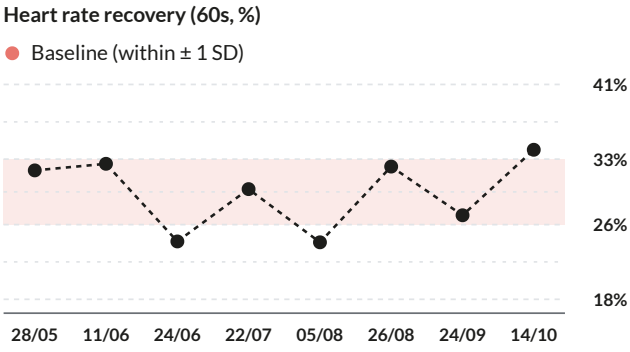
< 3 pts	3–6 pts	> 6 pts
likely noise	monitor trends	review the plan

Heat adds ≈1 point per 10 °C

One player, one pre-season

Example data from the Firstbeat Sports demo account. The same run, test after test:





−1.6 and −0.4 points: likely noise. −7.3: most likely the conditioning block taking effect. +3.6 as matches start: monitor the trend.

Checklist

☐ **Before week 1**
Protocol set, slot chosen, players briefed

☐ **Week 1**
SMFT and one maximal test done

☐ **Weeks 2–3**
Flat or rising results checked against load and QRT

☐ **Weeks 4–5**
Individual adjustments based on the trend

☐ **Final week**
In-season baseline locked

☐ **Season**
Test every second week, same day and warm-up

Want a second pair of eyes on your pre-season testing? Book a free 30-minute Team Load Review with a Firstbeat sports scientist.

Book your free review

content.firstbeat.com/team-load-review-firstbeat-sports

> Start small: one test embedded in the routine beats a perfect test battery that happens 1–2 times a year.

Sources: Firstbeat sports science team · Buchheit et al., Submaximal fitness testing in team sports (SPSR 266) · Firstbeat Sports demo account

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