

Status report


SAE TEVBCS3

**Brake Dynamometer
Standards Committee**

SAE J2789:2010

SAE J2928:BALLOT

SAE J2923: DRAFT



**SAE J2789:2010
Inertia calculation for
single-ended dyno testing**

Chairman: Carlos Agudelo-Link

Follow-up to SAE J2784 – FMVSS 105/135 dyno test

**Common methodology to
determine test inertia values**

Applicable to multiple test procedures:

SAE J2784:2010 FMVSS dyno test

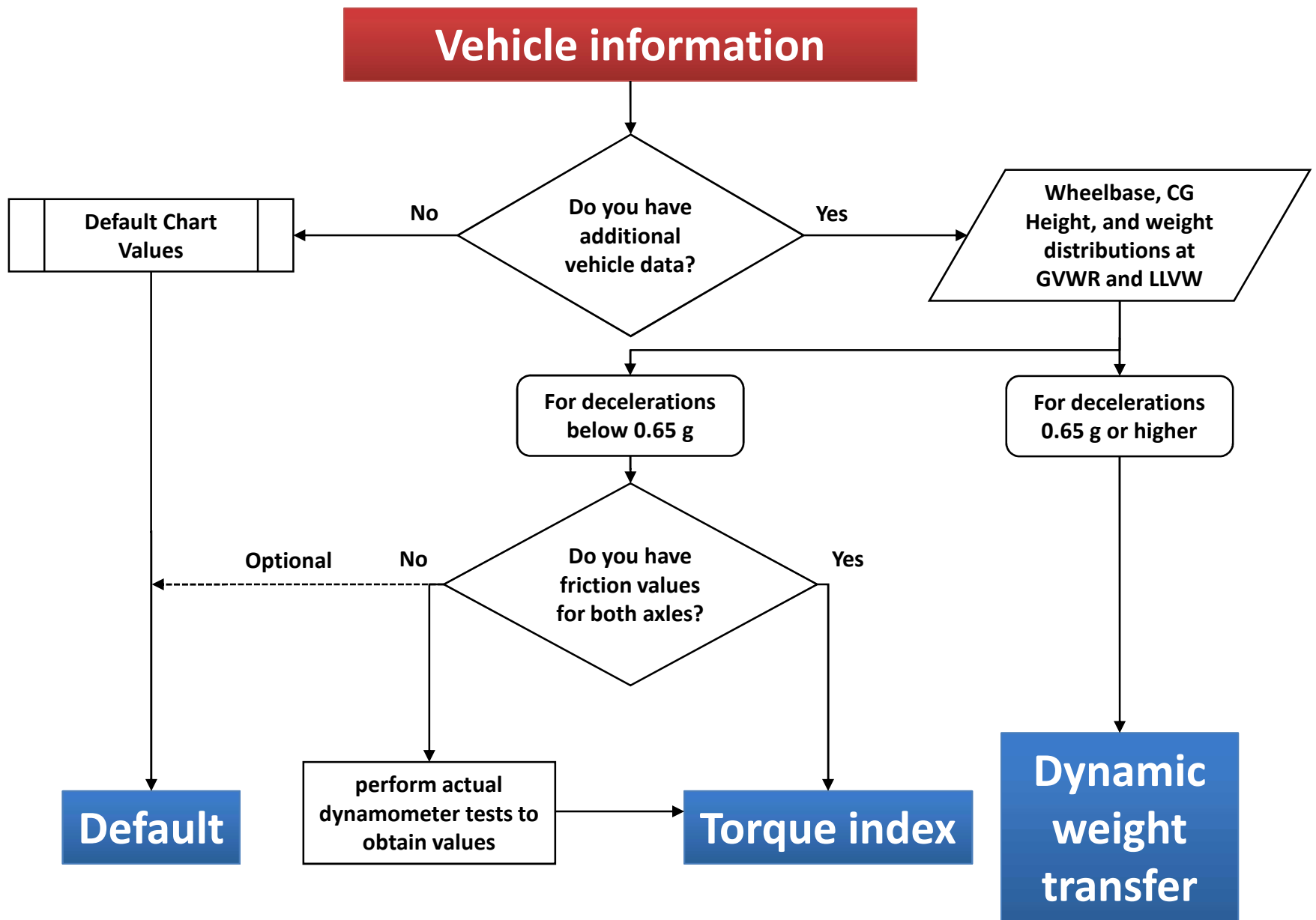
SAE J2928:BALLOT Aftermarket Rotor Evaluation

SAE J2923: DRAFT Brake Drag Measurement

Calculation method depends upon:

Vehicle information available

Deceleration level



Key contributors:


Chrysler — Paul Gritt (r)

Ford — Chip Evans

GM — Rick Kaatz

Tier-1s & 2s

Vehicle testing groups



SAE J2928:BALLOT

Aftermarket rotor structural evaluation test

Chairman: Mark Rogus - Link

**Assess minimum structural
and thermal adequacy**

Structural evaluation

comparing to the OE rotor:

ECE R90 and industry best practices

Standard crack classification

Standard dimensions and material
groups

Four rotor categories:

Original

Identical

Equivalent

Interchangeable

Dynamometer testing:

One rotor size per rotor group

Rotors below 92% OE/OES weight

Interchangeable rotors



Same rotor group:

Same design and material group

Within 10 mm on rotor OD

Within 6 mm on rotor thickness

Test rotor with highest KE/mass ratio

1 rotor = 150 cycles

2 rotors \geq 100 cycles

2 rotors \geq OE/OES cycles



Key contributors:

Affinia — Charles Darsey

Centric Parts — Steven Hughes

Paul Gritt Consulting LLC

TRW — Karl-Heinz Wollenweber

OEs, tier-1s, and tier-2s

Next steps:

Complete committee ballot

Address any issues

Complete SAE ballot and publish

A close-up photograph of a blue industrial brake assembly. The assembly features a large, curved metal component with a series of parallel slots, likely a brake drum or rotor. A yellow cylindrical component is visible on the right side. The background is a plain, light-colored wall.

SAE J2923:DRAFT Brake drag measurement

Chairman: Carlos Agudelo- Link

Industry effort to quantify brake drag systematically:

Brake drag matrix

Conditioning sequence

Dyno validation method

Brake drag measurements:

After conditioning per SAE J2522

Optional section for parking brake

Optional section for hot drag

Key questions:

Hubless fixture —
corner compliance/alignment?

Alignment bearing or std hub —
isolate bearing drag from brake drag?

Machine validation?

Key contributors:

BWI — Bill Myers

GM — Dave Antanaitis

TRW — Karl-Heinz Wollenweber

Link — Adam Link & Ken Hamann

Tier-1s

Next steps:

Answer questions re: fixturing,
combined drag, and dyno
validation

Update draft

Ballot

Thank you

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