°G

MA'AUNIN ZAFI NA GALLIERA

Ma'ana da Bayani Dalla-dalla

Juyi na 1.3

$$T_G = 2\,T_C$$

Wanda ya ƙirƙira: Joseph Galliera

An kafa bayanin: 18 ga Agusta, 2026

Wuri: Philadelphia, Pennsylvania, Amurka

Matsayi: bugu na harsuna da yawa cikin harsuna 36 — dangantakar ma'ana ba ta canja ba

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Fassarar da ba a duba ba: an shirya ta da taimakon AI kuma har yanzu ɗan asalin harshen bai duba ta ba. Rubutun Turanci ne ke da iko.

Unreviewed translation: prepared with AI assistance and not yet checked by a fluent speaker. The English edition is the controlling text. Corrected printing of Version 1.3, November 2026: language corrections only.

Ma'auni mai sauƙi da aka samo daga Celsius don isar da bayanin zafi a rayuwar yau da kullum.

Sanarwar kafawa

Joseph Galliera ne ya kafa Ma'aunin Zafi na Galliera (°G) a hukumance a ranar 18 ga Agusta, 2026 a Juyi na 1.0. Dangantakar ma'ana ta kasance daidai kuma ba ta canja ba a wannan Juyi na 1.3 na harsuna da yawa: lambar zafi a digirin Galliera ninki biyu ce ta lambar zafi a digirin Celsius. Juyi na 1.3 ya riƙe abin da ke cikin Juyi na 1.2 na fasaha ba tare da canji ba, kuma ya faɗaɗa bugun harsuna da yawa zuwa harsuna 36.

An sanya ainihin ma'anar ta zama ƙarama da gangan. Ma'aunin ba ya kawo sabon adadin zafi na zahiri, ko sabon sifili na thermodynamics, ko sabuwar hanyar daidaitawa. Sake fasalin lambobin digirin Celsius ne, wanda aka nufa musamman don sadarwa ta yau da kullum tsakanin mutane, musamman inda matakan rabin digirin Celsius ke da amfani amma aka fi son saituna da nuni da lambobi cikakku.

Taƙaitawa

Ma'aunin Zafi na Galliera, mai alamar °G, ma'aunin zafi ne da aka samo daga Celsius kuma dangantakar $T_G = 2\,T_C$ ce ke bayyana shi. Saboda haka, digirin Galliera ɗaya daidai yake da tazarar 0.5 °C (0.5 K), kuma ma'aunin yana da sifili ɗaya da ma'aunin Celsius. Manufar zane ita ce a riƙe saukin fahimta na Celsius, tare da bai wa yanayin zafin da mutane suka saba da shi wakilci mafi kyau da lambobi cikakku. Misali, saitunan thermostat na 20.0, 20.5, 21.0 da 21.5 °C sun zama 40, 41, 42 da 43 °G. A kan kewayon zahiri guda na 0–40 °C, Celsius yana ba da tazara 40 na digiri ɗaya, Fahrenheit 72, Galliera kuma 80. Tsakanin wurin daskarewar ruwa da wurin tafasarsa a 1 atm, adadin da ya dace shi ne 100, 180 da 200. Waɗannan bambance-bambance ne na wakilci, ba iƙirarin ingancin auna zahiri mafi girma ba. Abin da aka nufa da amfani da shi shi ne yanayi na yau da kullum, sarrafa yanayin cikin gida, ilimi da sauran sadarwa ta zafi da ta shafi mutane.

1. Iyaka da ƙa'idojin zane

Ana ba da shawarar Galliera a matsayin ma'auni na yau da kullum don mutane, ba a matsayin maye gurbin kelvin a thermodynamics ko Celsius a daidaita ma'aunai na kimiyya ba. Ka'idoji biyar ne ke jagorantar muhimman zaɓuɓɓukansa:

- Sauyi mai sauƙi: ninka digirin Celsius sau biyu; raba digirin Galliera biyu.
- Sifili da aka saba: 0 °G daidai yake da 0 °C.
- Wakiltar matakan 0.5 °C na yau da kullum da lambobi cikakku, wanda ke ba da tazarar digiri cikakku ninki biyu na Celsius a kan kewayon zahiri guda.
- Lambobi masu dacewa a zahiri da yadda mutane ke jin zafi a kullum.
- Babu ƙoƙarin kwaikwayon Fahrenheit daidai ko ƙara wani gusar da ba shi da dalili saboda kawai a saba da shi.

2. Ma'ana ta hukuma

Dangantakar da ke biye ce ke bayyana ma'aunin Galliera daidai:

$$T_G = 2\,T_C$$

saboda haka:

$$T_C = T_G / 2$$

inda T_G lambar zafi ce da aka bayyana a digirin Galliera, kuma T_C ita ce lambar zafin da ta yi daidai da ita a digirin Celsius.

2.1 Wurin sifili

Ma'aunin Galliera da na Celsius suna da wurin sifili ɗaya: 0 °G = 0 °C. Saboda haka, ma'aunin da aka saba da shi na daskarewar ruwa kusan 0 °G ne a cikin yanayi ɗaya da ake bayyana shi a matsayin 0 °C.

2.2 Tazarar raka'a

Don bambancin zafi, 1 °G daidai yake da 0.5 °C da 0.5 K. Bambancin zafi na 1 °G kuma daidai yake da 0.9 °F.

tazarar 1 °G = 0.5 °C = 0.5 K = tazarar 0.9 °F

3. Suna, alama da kalmomin fasaha

Sunan raka'ar shi ne digirin Galliera. Alamar da ake ba da shawara ita ce °G. A rubutun fasaha ana ba da shawarar barin sarari tsakanin lambar da alamar, misali 42 °G.

3.1 Me ya sa harafin G?

Zaɓin G wani ɓangare ne na sanya sunan mutum — Galliera sunan iyalin wanda ya ƙirƙira ne —, amma wasu ƙarin sifofi sun sa alamar ta zama kamar ta dace sosai yayin haɓaka ma'aunin. Waɗannan lura dalilai ne na zane, ba ɓangare na ma'anar lissafi ba.

- Ci gaba da al'adun sanya suna da aka saba: yawanci ana sanya wa ma'aunan zafi sunan mutumin da ke da alaƙa da ma'anarsu, kamar Celsius, Fahrenheit, Kelvin da Rankine.
- Kamanceceniya ta gani da C: a yawancin rubutun haruffa, babban G yana riƙe da buɗaɗɗen siffar C mai zagaye, tare da ƙara ɗan layi a ciki ko a kwance. Wannan yana sa °G ya yi kama da °C a gani ba tare da a rikita su ba.
- Dangantakar jerin haruffa da Fahrenheit: a jerin haruffan Latin, G yana zuwa nan da nan bayan F. Wannan yana ba da ɗan haɗin tunawa da °F, yayin da ginin lissafi ke kan Celsius.
- Abin tunawa na kula da ɗan Adam: G yana tsakanin F da H, don haka H na iya tunatar da manufar ma'aunin ta mayar da hankali kan ɗan Adam (Turanci human, "mutum") ba bisa ƙa'ida ba. Wannan abin tunawa ne, ba asalin alamar a hukumance ba.

Wani daidaito na daban shi ne kasancewar Palais Galliera, Gidan Tarihin Sutura da Salon Tufafi na Paris. Gidan tarihin ba shi da alaƙa da ma'aunin zafi kuma bai taka wata rawa a ma'anarsa ta

fasaha ba; an ambaci sunan da suka yi tarayya a kansa ne kawai a matsayin alaƙar al'adu mai ban sha'awa.

4. Manufa: nuna da saita zafi da lambobi cikakku

Dalilin aiki na ninka Celsius ya fi bayyana a sarrafa yanayi da sauran nunin da aka yi wa mutane. Yawancin thermostat da na'urorin dumama, iska da sanyaya (HVAC) suna amfana daga matakan 0.5 °C. A nunin Celsius, waɗannan matakai suna canzawa tsakanin lambobi cikakku da rabi. Galliera yana mayar da wannan jerin zuwa lambobi cikakku masu bin juna ba tare da canza ainihin daidaiton zafi ba.

Celsius	Galliera	Fassara
20.0 °C	40 °G	Cikakkiyar lamba
20.5 °C	41 °G	Cikakkiyar lamba ta gaba
21.0 °C	42 °G	Cikakkiyar lamba ta gaba
21.5 °C	43 °G	Cikakkiyar lamba ta gaba
22.0 °C	44 °G	Cikakkiyar lamba ta gaba
22.5 °C	45 °G	Cikakkiyar lamba ta gaba

Wannan fa'ida ce ta wakilci, ba iƙirarin daidaiton auna mafi girma ba. Na'urar ji da za ta iya bambance 0.5 °C za ta iya bambance 1 °G daidai; adadin bayanin ɗaya ne. Fa'idar da aka bayyana a nan ta shafi yawa da kusancin lambobi cikakku da ke samuwa ga mutanen da ke amfani da nuni ko suke magana game da zafi.

4.1 Kwatanta matakan digiri ɗaya a kewayon zafi iri ɗaya

Don kwatanta ma'aunan, a zaɓi kewayon zafi iri ɗaya sannan a ƙirga matakan digiri ɗaya. Bisa wannan ma'aunin, matakan Galliera sun fi na Celsius da Fahrenheit ƙanƙanta: bambancin 1 °G daidai yake da 0.5 °C, yayin da 1 °F daidai yake da 5/9 °C, wato kusan 0.556 °C. Saboda haka, matakin Galliera ɗaya ya fi na Fahrenheit ƙanƙanta da 10%, kuma girmansa 50% ne na matakin Celsius ɗaya.

Don kewayon mutane da muhalli na yau da kullum daga 0 zuwa 40 °C, kewayon zahiri guda ɗaya shi ne 32 zuwa 104 °F da 0 zuwa 80 °G. Saboda haka kewayon lambobin na ɗauke da tazara 40 na digirin Celsius ɗaya, tazara 72 na digirin Fahrenheit ɗaya, da tazara 80 na digirin Galliera ɗaya. Faɗaɗa kewayon zuwa 50 °C yana ba da tazara 50, 90 da 100 bi da bi. Tsakanin wurin daskarewar ruwa da wurin tafasarsa a matsin iska na yau da kullum (1 atm), adadin shi ne 100, 180 da 200.

Kewayon zahiri guda ɗaya	Celsius	Fahrenheit	Galliera
0 zuwa 40 °C kewayon mutane/muhalli na yau da kullum	tazara 40 0 zuwa 40 °C	tazara 72 32 zuwa 104 °F	**tazara 80** **0 zuwa 80 °G**
0 zuwa 50 °C faɗaɗɗen kewayon yanayin zafi	tazara 50 0 zuwa 50 °C	tazara 90 32 zuwa 122 °F	**tazara 100** **0 zuwa 100 °G**
Ruwa: daga daskarewa zuwa tafasa a 1 atm	tazara 100 0 zuwa 100 °C	tazara 180 32 zuwa 212 °F	**tazara 200** **0 zuwa 200 °G**

Kalmar «tazara» tana nufin rata tsakanin lambobi biyu masu bin juna. Daga 0 zuwa 40 akwai tazara 40 na digiri ɗaya, amma lambobi cikakku 41 idan an ƙirga 0 da 40. Wannan kwatanci ya shafi yadda ake rubuta da nuna zafi ne kawai. Nuna lambobin Galliera ba ya sa na'urar aunawa ta fi daidaito.

5. Yanayin zafi da aka saba da shi a rayuwar yau da kullum

Ninka biyu yana kuma ba da ƙaramin tarin wuraren ishara na yau da kullum masu sauƙin tunawa, tare da sifili a wurin daskarewa. Waɗannan lambobi misali ne, ba ƙarin ma'anoni ba.

Ishara	Galliera	Celsius	Fahrenheit
Ruwa yana daskarewa	0 °G	0 °C	32 °F
Cikin gida mai sanyi	36 °G	18 °C	64.4 °F
Zafin ɗaki na yau da kullum	40 °G	20 °C	68 °F
Ɗaki mai ɗumi	44 °G	22 °C	71.6 °F
Rana mai ɗumi	50 °G	25 °C	77 °F
Rana mai zafi	60 °G	30 °C	86 °F
Zafin jiki na yau da kullum	74 °G	37 °C	98.6 °F
Yanayi mai zafi sosai	80 °G	40 °C	104 °F
Matsanancin zafi a waje	100 °G	50 °C	122 °F
Ruwa yana tafasa*	200 °G	100 °C	212 °F

*A matsin iska na yau da kullum; ainihin zafin tafasa yana canzawa gwargwadon matsi da abin da ruwan ya ƙunsa.

6. Dabarun sauyawa

6.1 Celsius

$$T_G = 2\,T_C \qquad T_C = T_G / 2$$

6.2 Fahrenheit

$$T_F = 0.9\,T_G + 32$$

$$T_G = (T_F - 32) / 0.9$$

Lambar 32 da ake ƙarawa a sauyawa zuwa Fahrenheit ta shafi ƙimar zafi kanta, ba bambancin zafi ba. Idan bambancin zafi kawai ake sauyawa, 1 °G daidai yake da 0.9 °F.

7. Dangantaka da Celsius, Fahrenheit da Kelvin

Da gangan aka sa tsarin Galliera ya fi kusa da Celsius fiye da Fahrenheit. Yana riƙe da sifilin Celsius kuma ya bambanta ne kawai da wani ninkin ma'auni. Lambobin yau da kullum da ake samu wani lokaci na iya kama da lambobin Fahrenheit saboda tazarar lambobin ta fi ƙanƙanta, amma kamanceceniya da lambobin Fahrenheit ba manufar zane ba ce. Don tazarar zafi, 1 °G = 0.5 °C, yayin da 1 °F = 5/9 °C ≈ 0.556 °C. Don haka Galliera yana ba da kusan 11.1% ƙarin tazarar digiri cikakku fiye da Fahrenheit a kan kowane kewayon zahiri iri ɗaya (misali 80 da 72 a kan 0–40 °C), tare da riƙe 0 a wurin daskarewa na Celsius.

Kelvin ne ya ci gaba da zama ma'aunin thermodynamics cikakke da ya dace. Galliera ba shi da wani matsayi na musamman a cikakken sifili kuma ba a ba da shawararsa a matsayin maye gurbin thermodynamics ba. Cikakken sifili daidai yake da −546.30 °G saboda −273.15 °C × 2 = −546.30 °G.

8. Misalan kewayon lokutan shekara

Faffaɗan rukunonin da ke biye misalai ne masu amfani ga yanayi mai matsakaicin zafi mai lokuta huɗu. Da gangan suke bayani, ba ma'ana ba; lokutan shekara suna bambanta sosai gwargwadon latitude, tsayi daga teku, nisa daga teku da yanayin wurin.

Lokaci	Kewayon Galliera	Daidai a Celsius
Lokacin sanyi	−10 zuwa 30 °G	−5 zuwa 15 °C
Bazara / kaka	10 zuwa 50 °G	5 zuwa 25 °C
Lokacin zafi	40 zuwa 90 °G	20 zuwa 45 °C

Da gangan waɗannan kewayon suke shiga juna. Lokutan shekara ba akwatunan zafi daban-daban ba ne, kuma lokutan sauyi yawanci suna tarayya da zafin lokutan da ke maƙwabtaka da su.

9. Amfanin da aka nufa

- Thermostat da na'urorin sarrafa yanayi
- Hasashen yanayi na yau da kullum da hira game da yanayi
- Kwatancen ma'aunan zafi don ilimi
- Nunin jin daɗin mutane da yanayin cikin gine-gine
- Sadarwar zafi ta kai, ta masu sayayya da ta zane

Ana iya amfani da ma'aunin a wuraren fasaha inda aka bayyana sauyinsa a fili, amma wannan bayani ba ya ba da shawarar maye gurbin raka'o'in zafi na SI ko ma'aunan metrology da ake da su.

10. Abubuwan da ba manufa ba, da iyakoki

- Amfani da Galliera ba ya sa aunawa ta fi daidaito fiye da Celsius ko Fahrenheit. Abin da ke canzawa shi ne lambobin da ake nunawa da girman matakin digiri ɗaya.
- Galliera ba cikakken ma'aunin zafi ba ne.
- Misalan lokutan shekara da na jin daɗi ba ma'anonin yanayi na duniya baki ɗaya ba ne.
- Ma'aunin ba ya ƙoƙarin mayar da Fahrenheit tsohon yayi ko kwaikwayon lambobin isharar sa.

- Wannan bayani ba ya iƙirarin cewa ƙungiyoyin daidaita ma'aunai, cibiyoyin kimiyya ko hukumomin gwamnati sun karɓi ma'aunin.

11. Bugun takarda da ƙa'idar ma'auni da ba ta canzawa

Juyi na 1.0 ya kafa ainihin ƙa'ida na Ma'aunin Zafi na Galliera ta hanyar ainihin dangantakar $T_G = 2\ T_C$ da alamar °G. Juyi na 1.1 ya riƙe wannan asali ba tare da canji ba kuma ya ƙara kwatanci na adadi a fili na yawan tazarar lambobi cikakku a kan kewayon zafi daidai a Celsius, Fahrenheit da Galliera. Juyi na 1.2 ya riƙe abin da ke cikin Juyi na 1.1 na fasaha kuma ya ƙara fassarori masu daidaito da tallafin wallafawa da harsuna da yawa. Juyi na 1.3 ya riƙe abin da ke ciki na fasaha ba tare da canji ba kuma ya faɗaɗa bugun harsuna da yawa zuwa harsuna 36, tare da bayyana matsayin bitar kowace fassara a bangon farko.

Canji ga dangantakar ma'ana $T_G = 2\ T_C$ zai zama wani ma'aunin zafi daban, ba gyaran ma'aunin Galliera ba.

Don wallafawa ta adana, kowane juyin da aka fitar ya kamata ya riƙe lambar juyinsa da ranarsa. Idan aka ajiye shi a ma'ajiyar da ke ba da masu ganowa na dindindin, ya kamata a ambaci DOI ko mai ganowa makamancinsa a matsayin isharar jama'a ta hukuma.

12. Marubuci da bayanin tarihi

Joseph Galliera ya ƙirƙiri ma'aunin ne yayin da yake tunani kan yadda Celsius da Fahrenheit ke aiki a amfanin yau da kullum, musamman wahalar aiki ta matakan rabin digirin Celsius a thermostat. An yi la'akari da wasu hanyoyi daban, ciki har da hanyoyin da za su fi kwaikwayon Fahrenheit. Zanen ƙarshe ya ƙi ƙarin gusarwa da sarƙaƙiya da gangan, domin fifita dangantaka mafi sauƙi da ta cika manufar nunin mutane: ninki biyu daidai na Celsius. A bayani da bita na baya, an bayyana wannan fa'idar zane a adadi a fili: a kan kewayon zahiri iri ɗaya, Galliera yana ba da tazarar digiri cikakku ninki biyu na Celsius kuma kusan 11.1% fiye da Fahrenheit.

Sunan Galliera yana bin al'adar tarihi ta ma'aunan zafi da aka sanya wa sunayen mutane, kuma yana ba da gajeriyar alamar °G. Alaƙar gani da ta jerin haruffa da aka bayyana a sashe na 3.1 dalilai ne masu goyon bayan riƙe alamar bayan an zaɓi dangantakar lissafi.

13. Harshe da matsayin fassarori

Bugun Turanci shi ne rubutu mai iko kuma na hukuma na wannan bayani. Ana ba da fassarori don inganta samun dama da sadarwa ta ƙasa da ƙasa, kuma kowane bugun da aka fassara yana bayyana matsayin bincikensa a bangonsa. Bugun da aka yi wa alamar fassarar da ba a duba ba an shirya shi da taimakon fasahar AI kuma har yanzu wanda ya ƙware a harshen bai duba shi ba; za a fitar da gyare-gyare a juyi na gaba. Idan bugun da aka fassara ya bambanta a ma'ana da bugun Turanci, bugun Turanci ne ke da iko.

Lissafai, lambobi, masu canji na lissafi, alamomin SI, alamar °G, masu gano juyi, masu ganowa na dindindin da URL suna riƙe da ma'ana ɗaya ta fasaha a duk bugun harsuna.

14. Ambaton hukuma

Ambaton da ake ba da shawara:

Galliera, Joseph. The Galliera Temperature Scale (°G): Definition and Specification, Version 1.3. Philadelphia, Pennsylvania, USA, 14 November 2026. DOI: 10.5281/zenodo.24223800.

15. Bayanan wallafawa

Fili	Kimar hukuma
Suna	Ma'aunin Zafi na Galliera
Alama	°G
Marubuci / wanda ya ƙirƙira	Joseph Galliera
Juyi	1.3
Kafa bayanin	18 ga Agusta, 2026; an fitar da Juyi na 1.3 a 14 ga Nuwamba, 2026
Dangantakar ma'ana	$T_G = 2\,T_C$
Wuri	Philadelphia, Pennsylvania, Amurka
Ma'ajiya	Ana ba da shawarar Zenodo
DOI	10.5281/zenodo.24223800
Lasisin da aka ba da shawara	CC BY 4.0 don wannan takarda
Juyin da ya gabata	Juyi na 1.2 — DOI 10.5281/zenodo.22942202

Kari A. Teburin ishara cikin sauri

Galliera	Celsius	Fahrenheit
-40 °G	-20 °C	-4 °F
-30 °G	-15 °C	5 °F
-20 °G	-10 °C	14 °F
-10 °G	-5 °C	23 °F
0 °G	0 °C	32 °F
10 °G	5 °C	41 °F
20 °G	10 °C	50 °F
30 °G	15 °C	59 °F
40 °G	20 °C	68 °F
50 °G	25 °C	77 °F
60 °G	30 °C	86 °F
70 °G	35 °C	95 °F
80 °G	40 °C	104 °F
90 °G	45 °C	113 °F
100 °G	50 °C	122 °F

Kari B. Bayanin sanarwa game da Palais Galliera

Palais Galliera shi ne Gidan Tarihin Sutura da Salon Tufafi a Paris, Faransa. Sunansa yana da alaƙa a tarihi da Duchess ta Galliera kuma ba shi da alaƙa da Ma'aunin Zafi na Galliera da aka bayyana a wannan takarda. Daidaiton yana da ban sha'awa a al'adu amma ba shi da wani muhimmanci na fasaha ga ma'aunin.

Bayanan takarda

An shirya wannan Juyi na 1.3 na harsuna da yawa don wallafawa ta adana a matsayin sabon juyi a Zenodo, kuma ana gano shi da DOI 10.5281/zenodo.24223800. Juyi na 1.2 yana nan har abada don ambato a ƙarƙashin DOI 10.5281/zenodo.22942202, Juyi na 1.1 a ƙarƙashin DOI 10.5281/zenodo.22048681, da Juyi na 1.0 a ƙarƙashin DOI 10.5281/zenodo.21999740. Ya kamata a fitar da gyare-gyare ko faɗaɗawa na baya a matsayin sabon juyi maimakon maye gurbin fayilolin da aka adana a ɓoye.