



Product Environmental Report

Cook i with 2c i

Direct emissions
June 2022

Progress toward our 2030 goal

40% reduction in embodied carbon
Over 20% of manufacturing footprint
from recycled materials

Responsible Sourcing

100% recycled content in wood fiber
96% fiber-based due to our work to
minimize virgin logging

Responsible Manufacturing

Supplier Code of Conduct
audit and factory selection
in our supply chain



Smarter chemistry

- Zinc-ferrite pigments
- Copper
- Titanium dioxide
- Carbon
- Fluorine

Log it

• On our digital footprint
Cook i with 2c i in our Retail
• Using Bluetooth tracking
to improve customer experience

Recycle

Return our direct and
indirect waste
new if possible for reuse

First in the world to use certified recycled steel— in the battery tray

Direct emissions of product manufacturing based on U.S. configuration of Cook i with 2c i
product carbon footprint included in box label



Our product carbon neutrality strategy

We go for net-zero product work to be carbon neutral by 2030, reducing our total carbon emissions to net-zero by 2030. Our mission is to reduce our carbon footprint by 2030, and we will continue to work towards our ambitious goal to achieve net-zero carbon footprint for our products.

We will continue to work on our product carbon footprint and focus on transitioning to clean electricity, designing with a circular and low-carbon materials and optimizing our carbon footprint of our products, with our focus on the following areas: reducing our carbon footprint with clean electricity, focusing on low-carbon materials, and optimizing our carbon footprint with clean electricity.

How we're reducing emissions

- **Transition to 100 percent clean electricity for manufacturing:** We will transition our manufacturing electricity to 100% clean electricity by 2030, reducing our carbon footprint by 2030. We will continue to work on our clean electricity transition, and we will continue to work on our clean electricity transition.
- **Transition to 100 percent clean electricity for product use:** We will transition our product use electricity to 100% clean electricity by 2030, reducing our carbon footprint by 2030. We will continue to work on our clean electricity transition, and we will continue to work on our clean electricity transition.
- **Prioritize non-air transportation:** We will reduce our carbon footprint from non-air transportation by 2030, reducing our carbon footprint by 2030. We will continue to work on our non-air transportation, and we will continue to work on our non-air transportation.
- **Use recycled and low-carbon materials:** We will reduce our carbon footprint from recycled and low-carbon materials by 2030, reducing our carbon footprint by 2030. We will continue to work on our recycled and low-carbon materials, and we will continue to work on our recycled and low-carbon materials.

How we'll get to net-zero emissions

Our carbon footprint from manufacturing and product use will be net-zero by 2030. We will continue to work on our net-zero emissions, and we will continue to work on our net-zero emissions. We will continue to work on our net-zero emissions, and we will continue to work on our net-zero emissions.

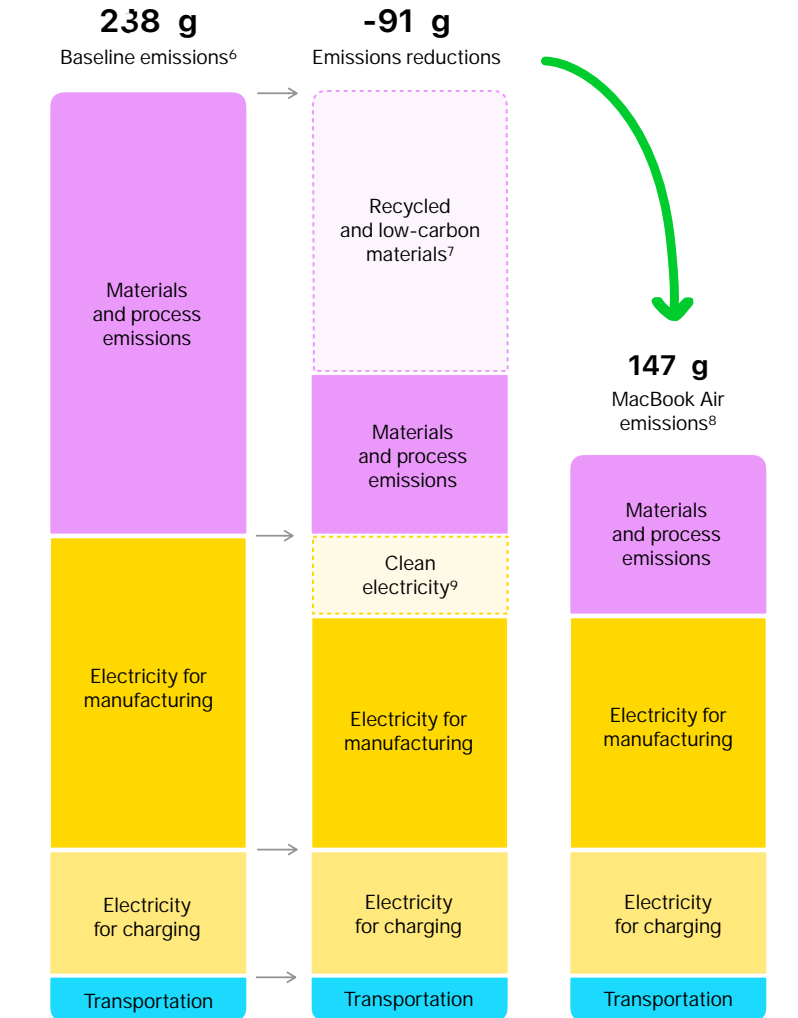
How we're monitoring progress

We will continue to work on our net-zero emissions, and we will continue to work on our net-zero emissions. We will continue to work on our net-zero emissions, and we will continue to work on our net-zero emissions. We will continue to work on our net-zero emissions, and we will continue to work on our net-zero emissions.

- No use of clean electricity for manufacturing or product use by 2030 (we will continue to work on our clean electricity transition, and we will continue to work on our clean electricity transition).
- 100% carbon intensity of materials of 2030 (we will continue to work on our carbon intensity of materials, and we will continue to work on our carbon intensity of materials).
- 100% of our carbon footprint from non-air transportation (we will continue to work on our non-air transportation, and we will continue to work on our non-air transportation).

Progress to reach carbon neutral

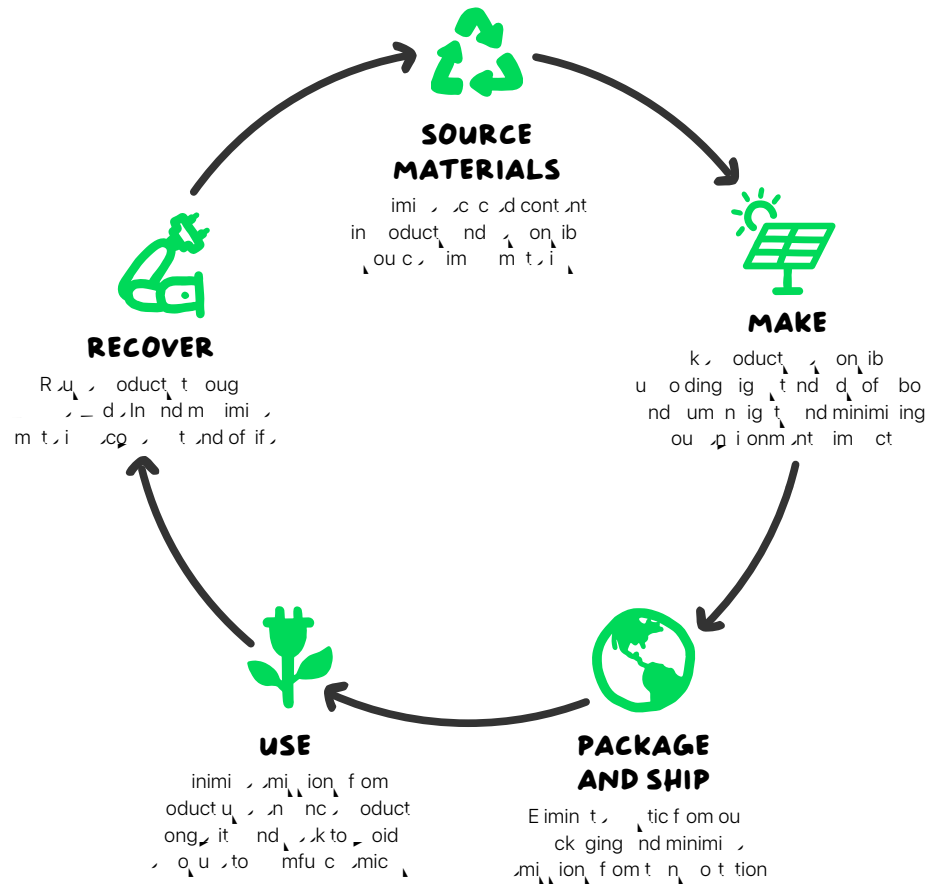
We've reduced emissions for a MacBook Air with 238 g CO₂e by 38% in total, including 1% from recycled aluminum and 4% from clean electricity. We're now working with our suppliers to transition to 100% clean electricity for production. We've also reduced emissions by 8% from recycled and low-carbon materials.



Taking responsibility for our products at every stage

We take responsibility for our products throughout their lifecycle—including the materials we use, the way we source them, how we make them, how we package and ship them, how we use them, and how we focus on the way we work with our customers to bring our products to life. We focus on the way we work with our customers to bring our products to life.

We sell millions of products. So making even small adjustments can have a meaningful impact.





Source materials

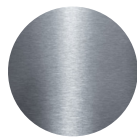
cook i wit 2 c i cont in 4 , c nt c c d o n w b , cont nt.1

o con , sim o t nt , ou c , w , wo k to duc t , m t , i w , u , nd im to on d , ou c , on c c d o n w b m t , i in ou o duct . nd w m k t i t n i t i o n w , m in committ d tot , , on ib , ou cing of im m t , i . W m m n m t , i , om , tot , min , ou c , nd t b i t , t i c t , t t nd d fo , m t , nd fin , . , o , qui , 1 , c nt of id , n t i f d t i n t n t u m t u n g t n g o d c o b t nd it i u m , m t , nd fin , to t i c i t , i n t i d - t u d i t .¹⁰ W , , oud to b , c o g n i d , wo d w i d , d , i n t , , on ib , ou cing of min , in ou o duct . u o duct d , i g n , o con id , t , f t o f t o , w o m k , u , nd c c , ou o duct , t i c t i n g t , u , of und d , of m f u b t n c , . u t nd d g o b , on d w t , qui d b w to o t c t o , nd t , p i o n m n t .



Rare earth elements

W , u , 1 , c nt c c d , , t , m n t , in m g n t , , n t i n g , 8 , c nt of t , tot , , t , m n t , i n t , d , i c , .



Steel

W , u , 9 , c nt c c d , t , i n t , b t t , t - f i t f o .



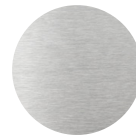
Ti

W , u , 1 , c nt c c d t i n i n t , o d , of t , m i n o g i c b o d .



Elastic

W , t n i t i o n i n g f o m f o , i f u , b , d , t i c , t o t o , m d , f o m n w b , o c c d , ou c , . o c c o o k i w i t 2 c i w , u , 3 , c n t o m o , c c d , t i c i n 1 c o m o n t .



Lumium

c , c t d n u m i n u m o m d , of 1 , c nt c c d u m i n u m w i c w , u , fo t , n c o u , of c o o k i w i t 2 c i .¹¹ - i o d j , t , m , t n g t d u b i t n d f w , f i n i - w i t o u t m i n i n g n n w b u i t , u m i n u m o) f o m t , t .



Smarter chemistry

c o o k i w i t 2 c i i f , of m f u b t n c , i k , b , i u m b o m i n t d f m , t d n t , C t t , , n i c i n t , d i , g , nd m , c u , 3 , nd 1 , c nt of t , m t , i in c o o k i w i t 2 c i , o p , d b o u R , g u t d S u b t n c , S , c i f i c i o n . W , g o b , on d w t , , q u i d b i m i n g t o u n d , t n d t , n o n - g u t d , u b t n c , i n , , t o f , , o duct - n , f f o t t t , q u i , n i n d u t - d i n g , of t n , n c t o u g t , n t i , u c i n . W , c o n i t n t i d n t i f t , m k u of p , 7 , c n t b m , of c d , i c , .



ac age a d Shi

c ook i wit 2 c i ck ging i m d ,wit 1 ,c nt
 c c d nd , on ib ,ou c d wood fib ,.

o im p ,ou ck ging w , ,wo king to imin t , tic inc , , c c d cont ,nt nd
 u , ck ging p , of t , wood fib , in ou ck ging i , it , c c d o com ,
 f om , on ib m n g d fo , t .¹⁴ nd w , , ot ct d o c , t d ,noug , on ib
 m n g d fo , t to co , t i gin wood fib , w , u , in ou ck ging.¹⁵ i , n u ,
 wo king fo , t , b , to g ow nd continu , to c , n ou i nd u if ou w t ,.

, w t n , ot ou o duct f om ou m nuf ctu , , to ou con um , w , , io iti ing ,
 c bon-int , n j , i ing mod , t n i t n , ot uc , i nd oc , n.

96%

of t , ck ging¹⁶
 i , fib , -b , d du , to
 ou wo k to imin t ,
 , tic in ck ging

45%

c c d cont ,nt in
 fib , ck ging

100%

of t i gin wood
 fib , in t , ck ging
 com , f om , on ib
 m n g d fo , t .¹⁴





Use

cook i wit 2c i u 7 ,c n t n g t n t ,
qui m nt fo ENERGY S _ R.17

W d i g n o u o d u c t t o b e n g e f f i c i e n t o n g - t i n g n d f . c o o k i w i t 2 c i
u o f t w o n d o w e f f i c i e n t c o m o n t t i n t i g n t m n g o w c o n u m t i o n .
W o u n o u o w n R i b i t n d E p i o n m n t t i n g b u i n g i g o o u
i g o o u t t i n g b f o t o u d o o u u o t c o n t i n u t o u g o u t c o d u c t
i f c c w i t g u o f t w o u d t o k d i c c u n t n d n t w o k o f u t o i d
i o f i o n t o i c t m i f n c o d d i m i o n t i d t o t c t i c i t o u
o d u c t u w b u i d i n g c n n g o j c t n d n g i n g w i t o u c u t o m t o
d u c t n d o i d o o t u n i t i t o u o t t o d c b o n i t i o n o f t g i d .

E erg co sum tio of ENER Y S R-rated roducts

d i c c o n i t n t n k m o n g t i g - o f o m i n g o d u c t t d b E N E R G Y S _ R
w i c t i c i f i c t i o n t t t i c f c t t 2 , c n t m o t n g e f f i c i e n t d i c o n
t m k t . c o o k i w i t 2 c i c o n u m 7 , c n t n g t n t , q u i m n t
f o E N E R G Y S _ R.17

esig ed to last

o n u o d u b i t w
c o o k i w i t 2 c i i n o u
R i b i t t i n g b u i n g i g o o u
t i n g m t o d t t i m u t
c u t o m t i n c .

ade ith smarter chemistr

W i g o o u c o n t o f o
m t i u t o u c - b d
o n c o m m n d t i o n f o m
t o i c o g i t n d d m t o o g i t .



Recover

Return your product with [Apple Trade In](#) and we'll give you a credit towards your next purchase. Or, you can also choose to donate your product to a charity.

When you return your product, we'll take care of it for you. We'll either recycle it or donate it to a charity. We'll also take care of any data on your device. We'll also take care of any accessories that come with your product. We'll also take care of any packaging that comes with your product. We'll also take care of any shipping that comes with your product. We'll also take care of any taxes that come with your product. We'll also take care of any other fees that come with your product.

Apple Trade In

Go to [apple.com/trade-in](#) for more information on how to return your product and of if you're eligible. Or, you can also visit [apple.com/trade-in](#) for more information.

We're offering [Apple Trade In](#) to help you get the most out of your Apple products. We'll give you a credit towards your next purchase. We'll also take care of any data on your device. We'll also take care of any accessories that come with your product. We'll also take care of any packaging that comes with your product. We'll also take care of any shipping that comes with your product. We'll also take care of any taxes that come with your product. We'll also take care of any other fees that come with your product.



efi itio s

io-based lastics io-b d t ic d m d f om bio ogic ou c t t n f om fo i-fu ou c . io-b d t ic ou u to duc , i n c on fo i fu .

Carbo foot ri t E tim t d mi ion c cu t d in cco d n c, wit guid in d qui m nt , cifi d b IS. 14 4 nd IS. 14 44. - i in nt unc t int in mod ing c bon mi ion du im i to d t imit tion. o t to com on nt cont ibuto to c bon mi ion d d t i unc t int b d , o ing d t i d oc b d p i on m nt mod , wit r cific m t . o t , m ining , m nt of c bon foot int w , on indy t , g d t nd um tion . C cu tion incud , mi ion fo t , fo owing if, c c , cont ibuting to Gob W ming o t nti (GW 1) in C.2 qui nc fcto (C.2)

ductio Incud , t t ction oduction nd t n ot tion of w m t i w , t m nuf ctu t n ot nd mb of t nd oduct ck ging.

Tra s ort Incud , gound i nd , t n ot tion of t , fini d oduct nd it , oci t d ck ging f om m nuf ctu ing it , to gion di t ibution ub . - n o t of oduct f om di t ibution ub to nd cy tom , i mod , d u ing , g d i t n c b d on gion gog .

Use , um , t o fou - , iod fo ow , u b fi t own , b d on t , oduct t , oduct u , c n io , b d on i to ic cy tom , u d t fo imi oduct . Eng u , i mu t d in iou w : fo , m b mod ing d i b tt , d in o t oug , fo ming c t i i k , m p i , nd mu ic b ck. Gog ic diff , nc , in t , ow , g id mi b n ccount d fo t gion .

E d-of-life rocessi g Incud , t n ot tion f om co ction ub to c c ing c nt , nd t , n , g u d in m c nic , ction nd dding of t .

o mo , info m tion on ou oduct c bon foot int m t odo g , i it .com/
p i on m nt/ n w .

Lo -carbo materials R f , to m t i c t d u ing oduction t c niqu , wit duc d c bon im ct uc . E i t n t d t c noog t t imin t , di ct g , n ou , g , mi ion f om t t dition uminum , m t ing oc) o uminum , m t d u ing o o ct icit in t d of co .

Rec cled materials R c c ing m k , b tt , u of finit , ou c , b ou cing f om cp , d t t n min d m t i . R c c d cont nt c im fo m t i u d in ou oduct , b n , ifi d b n ind , nd nt t i d t to c c d cont nt , t nd d t t confom to IS. 14 21.

Re e able materials W d fin , bio-m t i , t o t t c n b , g n , t d in um n if , n ik , , fib , o ug c n . io-m t i c n , u u f w , finit , ou c . ut , nt oug bio-m t i , t , biit to g ow t , not w , m n g d , on ib . R n w b m t i , t of bio-m t i m n g d in w t t n b , continuou oduction wit out d , ting t , t , ou c . - t w w , focu on , ou c t t , c tifi d fo t i m n g m nt ctic .

Su lier Clea E erg rogram Sinc t , o ct icit u d to m k , ou oduct i t , g t cont ibuto to ou p , c bon foot int w , , ing ou u i , d c boni t i , oduction incuding b t n itioning , ct icit u to 1 , c nt n w b , ou c .

Carbon footprint

Greenhouse gas emissions were calculated using lifecycle assessment methodology in accordance with ISO 14047 and 14044, standard and based on the following assumptions: (1) and 2) 2,8GWh to green electricity, (3) lifecycle assessment boundary for this product included the following: (1) production, (2) use, (3) distribution, (4) end-of-life, (5) recycling and (6) disposal.

Greenhouse gas emissions		across 2 chi 256GB storage
Total product footprint		147 kg CO ₂ e
Emissions from electricity use (assumed to be grid average) (2)		kg CO ₂ e
Lifecycle emissions (assumed to be grid average) (3)		147 kg CO ₂ e
Production		9
Distribution		8
Use		22
End-of-life recycling		1
GHG reduction credit (6)		38

Note: (1) Greenhouse gas emissions not totaled to rounding.

We will continue to reduce product carbon footprint for different configurations.

Configuration	across 2 chi
2,8GWh to green	147 kg CO ₂ e
2,12GWh to green	171 kg CO ₂ e

End notes

- 1 product of c d o n w b ,cont nt i t m of c tifi d c c d m t i t j ,tot p , m of t , d i c ,not including ck ging o in-bo cc o i
- 2 W , t i m t , t , c n t of , c t i c i t - r t d m i , i o n i n o u m n u f c t u i n g t t i , o u c d f o m c , n , c t i c i t b t t i b u t i n g t o o u c b o n m o d , c , n , n , g o c u d b o u u i , i n t , i o f i c , b , d o n t , u i , m n u f c t u i n g o c t i o n t t i m of o d u c t u n c . I n c u d d i n t i n u m b , i o n c , n , c t i c i t t t o i t u i , i , o c u d t of S u i , C , n E n , g o g m .
- 3 R , g u t d S u b t n c , S c i f i c t i o n d , c i b , t i c t i o n o n t u , o f c t i n c m i c u b t n c , i n m t i i n , o d u c t c c o i , m n u f c t u i n g o c , n d c k g i n g u d f o i n g o d u c t t o , n d c u t o m , R , t i c t i o n , d , j i d f o m i n t i o n w o d i c t j , g u t o g n c i , c o - b , q u i m n t , p i o n m n t t n d d n d , o i c i , E , o d u c t i f , o f C n d t t , c , t f o C o w , c o d i n I n d i - i n d i f o 2- o n g C o w , c o d i) n d S o u t o , w , w , c o n t i n u , t o , k g p , n m n t p f o o u C n d t t , c m n t . o d u c t c o m w i t t , E u o , n U n i o n D i c t j , 2 1 / 6 / E U n d i t m n d m n t i n c l u d i n g , m t i o n f o t u , o f , d u c i g - t m , t u , o d , , i , w o k i n g t o , o u t t u , o f t , , m t d u b t n c , f o n w o d u c t w , t c n i c o i b ,
- 4 c o o k i w i t 2 c i c i , d G o d t i n g i n t , U n i t d S t , t n d C n d i n c c o d n c , w i t I E E E 1 8 8 . 1 o U 1 1 n d i i t d , u c o n t , E , c t o n i c o d u c t E p i o n m n t m n t o o (E E - J R , g i t , E E - g i t , c o m u t , d i , n d m o b i , o n b , d o n p i o n m n t q u i m n t i n t , t n d d , o m o , i n f o m t i o n i t www.t.n.t .
- 5 W , c o g n i t t r n c , n o u c , o f , c t i c i t , r , i d u c b o n m i , i o n c o , t j i f , c c , g , f o m m n u f c t u i n g) w i c w , c c o u n t f o w n c c u t i n g o u o d u c t c o , 3 m i , i o n .
- 6 C b o n d u c t i o n , c c u t d g i n t b , i n , c n i o 1) N o u , o f c , n , c t i c i t f o m n u f c t u i n g o o d u c t u , b , o n d w t i , d , i b , o n t , g i d i b , d o n g i o n m i , i o n f c t o . 2) C b o n i n t i o n i t o f k , m t i , o f 2 1 , o u b , i n , f o o u 2 3 o d u c t c b o n n u t i t g o . C b o n i n t i o n i t o f m t i , f c t u , o f c c d c o n t n d o d u c t i o n t c n o o g . 3) g , m i o f t n o t t i o n m o d , i i o c , n t u c k i n g) b o d u c t i n , c o , t , , f i c , 2 1 7 t o 2 9) t o b , t c t u t , b , i n , t n o t t i o n m i , i o n o f o u o d u c t .
- 7 W , c u t , m i , i o n i n g f o m t u , o f c c d o o w c b o n m t i i n o u o d u c t b c o m i n g t , c b o n i n t i o n i t o f k , m t i , t o 2 1 , b , i n , W , c u n t o n q u n t i t , c b o n i n g f o m t u , o f c c d u m i n u m w i c m , n t , c t u m i , i o n o i d d , i k , g , W , n t o i m p , o u c c o u n t i n g o f c c d c o n t n t p , t i m .
- 8 G , n o u , g , m i , i o n w , c c u t d u i n g i f , c c , m n t m t o d o o g i n c c o d n c , w i t I S . 1 4 4 n d 1 4 4 4 t n d d , n d b , d o n c o o k i w i t 2 c i n d 2 , 6 G , t o g .
- 9 W , t i m t , m i , i o n i n g f o m u i , n w b , , c t i c i t b o c t i n g t o o u c b o n m o d , c , n , c t i c i t g n , t d b o u u i , i n t , i o f i c , b , d o n t , u i , m n u f c t u i n g o c t i o n t t i m of o d u c t u n c .
- 10 W , m m t i i n o u u c i n d u b i j i t o f i d , n t i f i d t i n t n t u m t u n g t n n d g o d (3 _ G) c o b t n d i t i u m m t , n d f i n , i n o u u c i n . i d - t m n t , k t o c o n f i m , o u c i n g c t i c , n d , t o f o u , o n i b , o u c i n g o g m . I n d d i t i o n o u f f o t c o n i d , b o d n g , o f i k i n c l u d i n g o c i p i o n m n t u m n i g t n d g p , n n c , i k .
- 11 R c c d m t i c i m i t o t , n c o u .
- 12 C m i c t t m t G , n S c , n b n c m k 3 o 4 o o t , q u i n t m t o d o o g i k , U . S . E S f , C o i c , c o n i d , d f , n d f , d f o u , G , n S c , n i c o m , n j , d m n t t o o t t u t , u b t n c , g i n t 1 8 d i f f , n t c i t i . o m o , i n f o m t i o n i t www.g.n.c.nc.mic.o.g .
- 13 t b i d f i n m b u i , i t - o t o t t , b , n , u i , f o m o s t n o n , - f o c o o k i w i t 2 c i t i d - t , i f i d , o W t , b U C (U 2 7 9 S t n d d) . U q u i t , c n t d i , i o n t o u g m t o d o t , t n w t , t o n g t o c i , o W t , t o n d f i (S i , 9 4 , c n t G o d , 9 9 , c n t n d t i n u m 1 , c n t) d , i g n t i o n .
- 14 R , o n i b , o u c i n g o f w o o d f i b , i d , f i n d i n S u t i n b , i b , S c i f i c t i o n .
- 15 o m o , i n f o m t i o n b o u t o u w o k t o o t c t n d c , t , o n i b m n g d f o t , , d o u E p i o n m n t o g , R o t .
- 16 , k d o w n o f U . S . t i c k g i n g b w i g t . d , j , i n k n d c o t i n g , c u d f o m o u c c u t i o n o f t i c c o n t n d c k g i n g w i g t .

End notes

¹⁷Energy consumption and energy efficiency under budget condition, ENERGY STAR and R qui ment for Com ut, including the amount of cook i wit 2 c i o mo info m tion i t www.nrg.gov. ENERGY STAR and ENERGY STAR k, g i t, d t d m k own db t, U.S. Ep ionm nt ot ction g nc.

cook i wit 2 c i i t, d wit fu c g db tt, nd ow, db t, 3 W US -C ow, d t, wit t, US -C to g S f, 3 C b, (2m).

- ff ow, t ow, mod, of t, t m. S t m i, ut down.
- S, ow ow, t t, t t i, nt, d utom tic ft, 1 minut, of in ct i (d f ut) o b, ctng S, f om t, m nu. W k, fo n, two k cc, n b d.
- Id -Di on S t m i on nd com t d o ding m c. S. Di big tn, w, t, d fin db ENERGY STAR og m R qui m nt fo Com ut, nd ut- ig tn, w, tu n d off. Conn ct d to Wi- i.
- ow, d t, no- o d Condition in w ic t, 3 W US -C ow, d t, wit t, US -C to g S f, 3 C b, (2m) i conn ct d to C ow, but not conn ct d to t m.
- ow, d t, ffici nc, g, of t, 3 W US -C ow, d t, wit t, US -C to g S f, 3 C b, (2m) m, u d ffici nc w nt, t d t 1, c nt 7, c nt, c nt nd 2, c nt of t, ow, d t, t d out ut cu nt.

ode	o er co sum tio for ac oo ir ith 2 chi		
	1 V	115V	2 V
ff	.13W	.13W	.1W
S	.27W	.26W	.27W
Id -Di on	3.9 W	3.14W	3.18W
ow, d t, no o d	.7W	.7W	.8W
ow, d t, ffici nc	88.8	89.1	88.8

¹⁸ d-in u b d on t condition, nd configu tion of ou t d-in d, ic, nd m q b, tw n on in, nd in- to t d-in. You mu t b, t, t 18, o d. In- to t d-in qui ct ion of id gp nm nt- i u d oto ID oc w m qui ng t i info m tion). ddition t, m f om o t d-in tn m.