

City Council Questions
October 22, 2019 Council Meeting

ITEM 6.1 ORDINANCES AMENDING CHAPTERS 8, 14, AND 24 OF THE CITY CODE TO ADOPT THE 2019 CALIFORNIA AND 2018 INTERNATIONAL CODES, INCORPORATING BY REFERENCE OTHER UNIFORM CODES, AND ADOPT REACH CODES

1. Would remodeling a single family home (or making significant modifications to any property) trigger a requirement to comply with the reach code? In other words, would remodeling require a property owner to convert from mixed-fuel to all-electric and comply with all other provisions of the reach code?

No. As proposed, the Reach Code would only apply to new construction.

2. A member of the public asked whether the 100% consumption offset goal for PV installation in SFH/duplexes is realistic, and whether it would be more realistic to set a “goal of kWh production per square footage area.” Can staff respond to this concern?

Retrofitting an existing PV system can be costly. The proposed Reach Code does not require SFH/duplexes to install PVs over and above the requirements in the California Energy Code. However, it does require prewire for expansion of the system to 100% consumption, which allows the owner to expand the panels on-site in a cost effective manner.

3. Can staff clarify to what extent the new codes apply to ADUs, particularly given state legislation restricting local regulations on parking requirements?

The proposed Reach Codes would be applicable to new ADUs. However, ADU’s would not be required to provide EV spaces. This requirement applies to the main dwellings on-site.

4. Why was the 1997 Uniform Code for the Abatement of Dangerous Buildings, the 2018 International Fire Code, and the 2018 International Property Maintenance Code not adopted before now? What have been the impacts of not adopting these until now?

The steps in the Code Adoption Process are as follows:

- **Building and Fire Codes are updated and adopted every three years (i.e.: 2012, 2015, 2018) by the International Code Council (ICC) and International Association of Mechanical and Plumbing Officials (IAMPO) and the National Electric Code (NEC) which is typically a year behind (i.e.: 2017); this is referred to as the Triennial Adoption. Currently these groups adopt codes by December 31st of the adoption year.**
- **Codes are then modified by the California Building Standard Commission (CBSC) and California State Fire Marshal (SFM) and are adopted by July 1st of the following year (i.e.: 2013, 2016, and 2019). Codes modified by the State of California group are then known as the California “Building/Fire/etc....” Code, instead of the International “Building/Fire/etc....” Code. If the State does not modify a code and we adopt it, the title “International” remains.**
- **The final step is for jurisdictions to review the State modifications to the codes and accept them as is or propose amendments; our amendments must be more stringent and we must be able to demonstrate that they are necessary to address local climatic, geologic, environmental or topographic conditions that affect the health, safety and welfare of our residents.**

The 2018 International Fire Codes is the root code of the 2019 California Fire Code and will be adopted this year per the process noted above. The International Property Maintenance Code (IPMC) does not have a California version created by the State. Therefore, the IPMC is adopted in its original version during the International Code Council’s triennial adoption.

The 1997 Uniform Code for Abatement of Dangerous Building was developed to afford jurisdictions reasonable procedures for the classification and abatement of dangerous buildings and to provide the chief building official with the proper legal steps in abating dilapidated, defective buildings which endanger life, health, property and public safety. This code was not re-adopted once the International Code Council became the author of building codes in 2008, with the 2007 California Code Series adoption. The IPMC was written with the intention of replacing the Uniform Code for Abatement of Dangerous Building. We have noted some vital verbiage to provide the chief building official with the proper legal steps in abating dangerous buildings is missing in this new replacement code. The adoption of the Uniform Code for Abatement of Dangerous Building would assist staff with sites that have serious ongoing issues.

5. What are the regulations regarding non-EV vehicles parking in spaces where EV chargers are in place?

AB 1452, which became effective on January 1, 2018, does state that you can sign a space to a vehicle that is non-charging but it also allows signage that allows non-charging vehicles to park in EV spaces if no other spaces are available. We will be using this type of signage moving forward.

6. On page 9 of the staff report, for single family dwellings, does one dedicated Level 1 circuit mean a 120V standard home outlet is installed?

Yes. The outlet provided will need to be a dedicated outlet and in an area accessible to plug in and charge an EV.

7. On page 9 of the staff report, for Level 3/DC Fast Charger, does this mean one charger per every 100 spaces? (No required number of chargers is listed.)

Yes. The developer would be required to provide one (1) Level 3/DC Fast Charger for every 100 spaces on-site. This space would be counted as a required EV space.

8. Given the serious and increasingly urgent climate situation, and the recent proliferation of state-of-the-art electric cooking appliances like induction cooktops and electric BBQ grills, why would we not disallow gas in residential? Why not go all electric in residential as Berkeley has done?

During our general survey we found that disallowing gas stoves/ranges in single family homes raises concerns from the public. The SVCE, which also conducted outreach, noted that concerns were also expressed about disallowing gas fireplaces and fire pits. Additionally, due to the short timeframe for implementing a Reach Code, we did not have time for extensive outreach and engagement with restaurants regarding operational and economic impacts related to disallowing gas cooking appliances. Our current Wood Burning Ordinance allows exceptions for restaurants that use wood burning stoves and pizza ovens. Therefore, staff used the current Wood Burning Ordinance as a guide and created an exception for restaurants that want to use gas stoves.

However, Council can revise the code to disallow gas appliances and fireplaces for SFH/duplexes and gas appliances for restaurants.

9. Can we allow only wood-burning devices that are [U.S. EPA certified](#) inserts/stoves, pellet heaters, and masonry heaters?

The Wood-Burning Appliances Ordinance does have that requirement. Staff would additionally like to note that although the ordinance language shows up as inserted text, it was relocated without revisions to another section of Chapter 8.

10. Is there a way to incentivize induction cooktops for restaurants? Maybe streamlined permitting, fee reduction &/or promotion on our website etc.? Maybe something better?

Council may suggest or approve any of the aforementioned suggestions. A new program and additional staff resources would be needed.

11. The staff report says that for SF homes and duplexes we'll require "PV Installation per California Energy Code, prewired to expand system to accommodate an all-electric building at 100 percent of annual kWh consumption offset." A constituent tells me that a 100% consumption offset is a very tall order especially after moving to all electric and including EVs. (They were never able to achieve anything close to that with their home due to bad exposure on some sides of the roof, large heritage trees shading other portions of the roof, etc. My experience is the opposite, by the way. Solar consultants told us we don't use enough energy to merit a solar installation unless we get an electric car.) My question is: how realistic is the 100% percent goal and if unrealistic should we set instead a goal based on kWh production per square footage area as other cities have done?

For single-family residences/duplexes, staff is proposing prewiring of the system for 100% of consumption offset. PV installation would not be above that required by the California Energy Code. As noted earlier, retrofitting the wiring of an existing building and roof can be costly; prewiring provides the owner an opportunity to expand their system in an economical manner.

There may be unique circumstances that, through Subsection 102.3 of our Mountain View Green Building Code, would allow an applicant to seek an exception to the code requirements. This would be reviewed by the Chief Building Official on a case-by-case basis.

12. For multi-family the staff report says, "PV Installed on 50 percent of Roof Area and meet mandated California Energy Code." What does that mean?

The California Energy Code has a minimum requirement for PV installation for low-rise residential buildings (three stories or lower). The proposed Reach Code for PVs on 50% of roof area requires a larger PV installation and is proposed to be applied to all multi-family, mixed use and non-residential buildings. Staff developed the requirement with the help of TRC, the consultants utilized by Silicon Valley Clean Energy. The 50% requirement would meet the cost-effectiveness criteria set by the California Energy Commission.

Staff will be proposing an amendment to the draft code to clarify that low-rise, multi-family buildings will have to meet the greater of the 50 percent of roof area installation or the amount of PV installation required by the California Energy Code for these building types covered by low-rise the California Energy Code.

Council could suggest different criteria as part of the adoption process. However, they would have to meet the criteria set by the California Energy Commission.

13. As for vehicle chargers, why were these numbers chosen? Were more considered? What have other cities done?

Yes, staff had originally proposed requiring all parking spaces to have EV charging capability in response to AB-684, which would have required existing multi-family dwellings and non-residential parking lots to be 100% EV ready (electrical panel capacity, conduit, breaker and wiring to allow future EV chargers to be installed) with an unspecified timeline. In response to the potential bill, a number of developments in building permit review had added this feature to their plans. However, staff found out that AB 684, which had passed both the Senate and Assembly, was vetoed by the Governor. Additionally, during the outreach meetings, developers expressed concerns related to cost and

questioned the degree of utilization of the 100% requirement. The developers additionally noted that currently they are providing about 10% of the spaces as EV Ready. Staff therefore is proposing an increase to 15%.

ITEM 7.1 SUSTAINABILITY ACTION PLAN 4

1. On page 17 of the staff report, how would the existing plans to address sea level rise fit in with Item E?

The existing plans and any updated plans to address sea level rise (SLR) would be an important component of a City resilience and adaptation plan, since SLR is one of the major climate change factors that will affect Mountain View. Sustainability staff would coordinate with Public Works closely on this.

2. On page 18 of the staff report, TOT is cited. Do we have any information yet as to the increase in TOT that the City will receive as a result of TOT being imposed on short-term rentals?

The original estimate of TOT that might be generated from short-term rentals (STR) was approximately \$1.0 million; however, no amount was built into the FY 2019-20 budget due to having insufficient data for an accurate projection. The first quarterly TOT payment was just received from Airbnb, Inc. in excess of \$260,000. However, it is premature to project how much will be received for the fiscal year based on this one payment. Staff will be reporting at the Midyear Update on the status of revenues received from STRs.

3. On Attachment 1, which items were previously approved by Council, and therefore, no GHG reduction calculated? Is it everything with a zero?

Attachment 1 does not include any actions that were previously approved by Council; it only includes newly proposed items. Items in Attachment 1 that have a "0" for "Annual GHG Reduced" are not expected to result in any direct GHG reductions. Only Attachment 3 includes items already approved by Council or that will be approved separately (such as the Zero Waste Plan). Those already-approved items are indicated by an "N" in the "New?" column.

4. What is the expected total GHG reduction for the SAP 4 actions that can be quantified? If all of these are implemented in the planned timeframe, where would we be vs. the overall GHG reduction goals?

The total annual reductions from the newly proposed actions would be approximately 27,500 MT CO₂e per year. This includes three items (S4.3, S4.5, and S4.6) where some or all of the expected GHG reductions would be in areas not currently accounted for in the City's GHG inventory (such as food consumption). Other plans that are currently under development, such as the Zero Waste Plan and the Comprehensive Modal Plan, will also include cost and GHG reduction estimates for each item. These estimates are not included in the above total.

Staff believes that the newly proposed actions, *along with the actions already approved by Council*, should allow the City to stay on track for its near-term GHG reduction goals. However, it is difficult to predict the exact reductions that will be achieved, as some key information remains unknown. Many of the planned actions are expected to yield significant annual GHG reductions, such as the Citywide TDM, reach codes to promote building electrification, and active transportation infrastructure currently in design or construction. However, achieving the City's longer-term GHG reduction targets beyond the timeframe of SAP-4 will require additional investment and effort, as many of the proposed programs (and associated GHG reductions) will require additional funding to extend beyond FY 2021-22.

The uncertainty in GHG forecasting is largely because the actual GHG reductions achieved will be highly dependent on program specifics; especially those that will require further Council approval.

This includes items such as a Citywide Transportation Demand Management Ordinance (where the primary factor affecting GHG reductions is the specific trip reduction targets for new development), a Building Benchmarking and Disclosure Ordinance (where the primary factors affecting GHG reductions are how many buildings are included and what type of mandatory audit/retro-commissioning measures are required), and bicycle and pedestrian infrastructure improvements (with the factors being amount and quality of infrastructure improvements). Staff has requested flexibility in implementing the actions approved as part of SAP-4 to allow for adjustments based on measured success of programs in reducing emissions, to ensure the City stays on track toward its reduction targets.

5. Why does staff think that a bike share program should be pursued given the City's past experience with bike share programs? (T3.3)

Bike share is a proven measure for addressing first/last mile trips, reducing traffic congestion, encouraging more space-efficient mobility, and reducing GHG emissions in cities throughout the world. Since the initial Bay Area Bike Share program was implemented, bike share technologies have become better suited for low-density contexts such as Mountain View, and program costs have dropped dramatically to the current model of privately-provided systems implemented at no cost to the City. The business viability of these privately-provided bike share systems continues to evolve, and operators interested in operating in Mountain View are also affected by a current contract issue affecting bike share in large Bay Area cities, including San José. While these issues evolve, staff recommends keeping the bike share pilot program open, since bike share remains an important, low-cost strategy that may become more viable as scooter share is implemented or regional issues are addressed.

6. What is the rationale for developing a City-funded incentive or rebate program for e-bikes, cargo bikes and/or other personal mobility devices? Have we heard that the purchase of these devices is a barrier to people using them? (T3.6)

There is research showing that purchase price is a significant barrier to e-bike and cargo bike adoption, and that rebate programs for these items are very effective in encouraging adoption. Studies suggest that up to 60-70% of trips on e-bikes replace car trips. E-bikes and cargo bikes in particular have more cost-effective GHG reduction potential than electric vehicles, yet there are currently no statewide rebate programs for these devices.

7. I often hear from developers that the current bicycle parking ordinance requires more parking for bicycles than will ever be used and much more than neighboring cities. What is the rationale for updating the bicycle parking ordinance? (T3.7)

Currently, bicycle parking standards are based on a percentage of vehicle parking spaces rather than factors that correlate to demand. This can result in either over-providing or under-providing bicycle parking facilities, depending on the type and location of development. The proposed update to the bicycle parking ordinance would consider potential standards such as new requirements based on number of dwelling units and commercial square footage, as well as guidelines that distinguish requirements for visitor, resident, and employee facilities. This revision would also include updated standards and siting guidelines for shopping centers and other community centers to significantly improve and increase bicycle access, parking and safety.

8. What are MUDs? (T7.8)

Multi-unit dwellings.

9. Will the City still do LOS analysis in addition to VMT analysis?

The City will continue to have Level of Service (LOS) analyzed as part of the development review process; it will be conducted through a traffic operational study separate from the CEQA process.

10. What is CIMIS? (W1.2)

CIMIS is the California Irrigation Management Information System, which provides weather data that is used by smart irrigation controllers to adjust irrigation levels to local weather conditions.

11. Why is it necessary to re-adopt dual plumbing requirements for new construction? (W2.1)

To remain in effect, local amendments to the building code must be re-adopted every three years along with the State's code update cycle.

12. Why is developing bird-safe design guidelines not included in the SAP 4?

While staff attempted to include all relevant items from department work plans in the already-approved actions indexed in Attachment 3, this item was missed. However, bird-safe glass is included in the proposed Green Building Code update. Staff can add bird-safe design guidelines to SAP-4 at Council's direction, to have its implementation tracked as part of SAP-4 although it is already being addressed.

13. What is the CURB tool? (S2.6)

The CURB tool was developed by the World Bank in partnership with the C40 Cities Leadership Group to allow cities to evaluate actions to reduce GHG emissions. It is an Excel-based tool that allows for transparent modeling of low carbon actions based on local city data and assumptions developed by subject matter experts.

14. What is the level of effort/funding to implement Collaborate Mountain View? What would be the goal of this tool? (S3.1)

Collaborate Mountain View will serve as the Sustainability Division's primary platform for providing information to, and soliciting feedback from, the Community. It is almost ready for launch (likely by mid-November) and will require a modest amount of work. The first-year cost of the platform is about \$10,000, with successive years between \$6,500 and \$15,000, depending on the type of license/number of users.

15. How does the Council know if the SAP 4 is in alignment with Council direction to do the projects that return the greatest GHG reduction for the investment in staff time and budget dollars? Is it by manually combining Attachments 3, 2, and 1, and also searching for GHG reduction amounts and staff time and budget dollars for previously approved projects to answer this question? Can the estimated GHG reduction and budget dollar investment for each item in Attachment 3 be added to Attachment 3?

Attachment 1 includes all newly proposed actions, along with annual GHG reduction and cost-effectiveness estimates for every item where this information was possible to calculate. In developing SAP-4, staff used the cost-effectiveness calculations it developed as part of reviewing the Environmental Sustainability Task Force 2 (ESTF-2) recommendations, which were presented to Council on December 3, 2018. The GHG-reducing actions included in SAP-4 are primarily derived from the more cost-effective actions proposed by the ESTF-2. Council can compare the GHG cost-effectiveness of all proposed programs for which this information could be calculated. Staff was

unable to calculate emissions reductions for many items that are expected to yield reductions, either because there was not yet enough detail about the specific programs proposed or because methodologies do not exist to calculate GHG reductions from this type of program (as is the case with many outreach/education programs).

Staff did not calculate the expected GHG reductions from already-approved actions for one of several reasons: (1) staff time constraints, (2) lack of information necessary to perform the calculations, (3) lack of a calculation methodology for GHG reductions from the type of program proposed, and (4) GHG reductions are being calculated as part of a separate process (e.g. Comprehensive Modal Plan, Zero Waste Plan). Outside consultant expertise would be needed to calculate GHG reductions from all already-approved items due to the complexity involved.

In cases where there were alternative options to achieve a specific goal (such as encouraging the purchasing of electric vehicles through either a group-buy or rebate), staff has chosen the more cost-effective option (in this case a group-buy program). Similarly, incentives for e-bikes are significantly more cost-effective in terms of GHG reductions than incentives for electric vehicles. In many cases, however, there are not many alternative options to achieving GHG reductions within a specific sector. For example, transportation emissions reductions can only be achieved through a combination of reducing vehicle miles traveled and increasing the use of zero-emission vehicles such as electric vehicles. In general, emission reduction efforts in this sector are more expensive than in other sectors, but this sector accounts for 65% of the City's GHG emissions and will therefore need to be addressed to achieve the City's adopted GHG reduction targets.

16. P. 9 of the staff report says, "...the following seven different overall benefits [are] to be used as criteria for including actions in SAP-4 (also shown at the end of Attachment 1)..." Given the recent IPCC report stating that, "...limiting warming to 1.5°C is not physically impossible but would require unprecedented transitions in all aspects of society...", shouldn't our actions have a strong bias in favor of net near-term savings, in other words net savings by 2030? What revisions might we make given that new timeframe information?

Staff developed SAP-4 to prioritize near-term GHG emissions reduction through 2030, and all cost-effectiveness calculations included in Attachment 1 are based on cost per *cumulative GHG reductions expected through 2030*. Given that 65% of the City's emissions are from transportation, investment in the infrastructure necessary to reduce vehicle trips and support accelerated adoption of electric vehicles will be key to achieving the necessary reductions by 2030. However, many of these actions are infrastructure projects that are approved through a separate process from SAP-4. The importance of accelerating this infrastructure is why staff chose to highlight proposed items T2.16 and T2.17, which would be considered as part of the CIP process.

17. The staff report says, "T2. Complete a low-stress network of active transportation infrastructure." The actions seem to be aimed mostly at wheeled active transport like bikes and scooters, plus a little on pedestrian safety. But a viable pedestrian network depends on other things like attractive pathways protected from heat and auto fumes (by trees, other vegetation, side sidewalks and appropriate building interface), places to walk to like neighborhood-serving retail, amenities for seniors (like pocket parks and benches), amenities for runners (urban greenways, linear parks). How can we enhance actions directed at pedestrians?

While there are a number of projects focused on improvements to bicycle infrastructure, more than half of the actions already in progress listed under goal T2 are partially or solely focused on improvements serving pedestrians. Staff can ensure that pedestrian infrastructure is included as part of any new projects proposed as part of item T2.17 ("Accelerate implementation of active transportation projects over three years with new Active Transportation CIP team.") Many of the strategies and design guidelines included in the North Bayshore and East Whisman precise plans support pedestrian-friendly

design and complete neighborhood strategies. These types of strategies could be included in the CIP process and/or planning documents at the direction of Council.

18. The staff report says, “P2. Increase the City’s tree canopy to provide environmental benefits, including carbon sequestration...” and lists three new actions including coordinating tree planting with Google and Canopy. How can tree planting be better coordinated to enable and encourage walking? The Sierra Club has a plan to align tree planting with bike and pedestrian paths. Can the City coordinate with the Sierra Club as well?

In general, tree planting programs focus on street trees, which would support pedestrian activity. Staff can further consider how tree planting may best support active transportation as part of the design of a tree planting program, as well as coordinating with outside agencies as appropriate.

19. Can we add any actions to preserve neighborhood-serving retail and restaurants and thus promote walking to do errands over driving and buying online, both of which have much higher carbon footprints? Other cities (Redwood City, Burlingame) are doing something like this. Could this be coordinated with the upcoming Council workplan item on small businesses?

The City has the following strategies related to preservation of neighborhood-serving retail:

- **Small business strategy (FY 2019-20 Council goals) - Background analysis to begin in 2020 followed by small business outreach. Staff anticipates a study session, including development of potential goals and program options, in Q3 2020.**
- **Some of our Precise Plans identify neighborhood-serving retail requirements for new development (El Camino, North Bayshore, East Whisman).**

For redevelopment projects, retaining neighborhood-serving commercial uses is considered a community-benefit. An example is the Elan apartment project at Castro and El Camino, which relocated existing businesses into new space (Rose Market and Le’s Tailoring).

20. Does staff know about problems watering landscaping with recycled water in N Bayshore? I have heard that it has been too salty and has killed plants and trees. Is this a permanent characteristic of recycled water or was it a fluke that can be easily corrected?

Staff is aware of this problem, and is currently working with regional partners to improve the quality of recycled water available to the City (SAP-4 action W2.2). This is a common issue with recycled water, but can be addressed through improvements in the treatment process.

21. The staff report says, “P1. Manage open space to protect wildlife habitat, provide ecosystem services, and support sustainability goals.” Recent research has indicated that cities, not just open space, can be important places to protect wildlife and reduce species extinction as we extend the use of farmland heavily treated with pesticides. Many cities (like SF for example) are now incorporating urban wildlife corridors, greenways and linear parks into their plans to protect wildlife. How and where might we add actions related to this for Mountain View?

Currently, staff has only indexed existing efforts related to wildlife and habitat management as part of compiling Attachment 3, and has not proposed new items in this area. If Council wishes to add new actions related to wildlife management, staff could explore what type of actions could be added to SAP-4 or other department work plans, as appropriate. Any new actions would require additional staff capacity.

22. The staff report says, “S2. Improve GHG management and accounting. Achieving the City’s GHG reduction targets requires efforts to improve the climate action and GHG inventory reporting processes, and to evaluate the City’s GHG targets.” Is staff aware of StreetLight data platform and how it might more accurately monitor changes in commute patterns, like mega-commutes caused by displacement, etc.?

Staff is aware of StreetLight data and is currently exploring possible applications, including GHG calculations. Staff is also collaborating with Google on development of their “Environmental Insights Explorer” tool, which provides similar measured transportation data at no cost to cities for purposes of GHG inventory calculations.

23. Can efforts to encourage more plant-based diets be coordinated with efforts to promote sustainable small business like neighborhood-serving retail and food service, electric and other efficient appliances, etc.?

The Community Climate Solutions (S4.3) and Cool Block programs (S4.5) include household-level outreach to promote a wide variety of sustainability actions, including energy efficiency, electrification of appliances, reducing vehicle use, and adopting a plant-based diet. Staff plans to include the promotion of a plant-based diet and other sustainability behaviors into SAP-4 outreach programs wherever appropriate. Expanding these efforts to new programs in other departments may be feasible, but may require additional staff capacity.

24. Can diet actions be broadened to include sustainable agriculture, farm-to-table food service, etc.?

Staff can broaden any of the proposed actions at the direction of Council. However, any additions to the scope or number of proposed programs would either require additional staff or involve reducing the scope of, or eliminating, other proposed SAP-4 programs.