UNITED STATES
CONSUMER PRODUCT SAFETY COMMISSION
4330 EAST WEST HIGHWAY
BETHESDA, MD 20814

This document has been electronically approved and signed.

BALLOT VOTE SHEET

DATE: April 25, 2011

TO: The Commission
Todd A. Stevenson, Secretary

THROUGH: Cheryl A. Falvey, General Counsel
Kenneth R. Hinson, Executive Director

FROM: Philip L. Chao, Assistant General Counsel
Leah Wade, General Attorney

SUBJECT: Notice of Draft Final Rule to Amend Bicycle Regulations at 16 C.F.R. Part 1512

Ballot Vote Due: May 2, 2011

The Office of the General Counsel is providing a staff briefing memorandum recommending that the Commission issue a final rule that would make limited, technical amendments to the Commission's regulations at 16 C.F.R. part 1512, *Requirements for Bicycles*. A draft final rule is provided at Tab D of the briefing package for your consideration.

Please indicate your vote on the following options.

I. Approve publication of the draft final rule in the *Federal Register* without change.

_____ _____
(Signature) (Date)

II. Approve publication of the draft final rule in the *Federal Register* with changes. (Please specify.)

_____

_____

_____

_____ _____
(Signature) (Date)

III. Do not approve publication of the draft final rule in the *Federal Register.*

_____ _____
(Signature) (Date)

IV. Take other action. (Please specify.)

_____

_____

_____

_____ _____
(Signature) (Date)

UNITED STATES
CONSUMER PRODUCT SAFETY COMMISSION
4330 EAST WEST HIGHWAY
BETHESDA, MD 20814

This document has been electronically approved and signed.

MEMORANDUM

Date: April 25, 2011

To : The Commission
Todd A. Stevenson, Secretary

THROUGH : Cheryl A. Falvey, General Counsel
Kenneth R. Hinson, Executive Director

FROM : Robert J. Howell, Assistant Executive Director
Office of Hazard Identification and Reduction
Vincent Amodeo, Division of Mechanical Engineering
Directorate for Engineering Sciences

SUBJECT : Draft Final Amendments to 16 CFR Part 1512, *Requirements for Bicycles*

A) Introduction

The U.S. Consumer Product Safety Commission (CPSC) published a notice of proposed rulemaking (NPR) in 75 *Federal Register* 67043, dated November 1, 2010 (Tab A). The proposed rule would update 16 C.F.R. part 1512, *Requirements for Bicycles,* by adding and clarifying terms and requirements necessary for bicycle manufacturers to conduct testing and certification in accordance with the Consumer Product Safety Improvement Act of 2008 (CPSIA), and excepted certain types of bicycles or components from testing under specific sections of the regulation. Most of the proposed amendments were in response to a request for clarification of the standard from the Bicycle Product Suppliers Association (BPSA). This briefing package provides staff's responses to the comments on the NPR, staff's recommendations for a draft final rule, as well as a final regulatory analysis to evaluate the possible economic impact of the draft final rule.

B) Public Comments (Tab B)

Staff received 13 comment submissions, including 10 from individuals, 1 from Nirve Sports, 1 from Consumers Union, and 1 from the Bicycle Product Suppliers Association (BPSA), regarding the notice of proposed rulemaking for bicycles (Docket No. CPSC-2010-0104). Six commenters expressed their support for the proposed amendments to the bicycle regulation without modification, although some urged a more comprehensive review. Two comments were unrelated to the proposed rule. Five commenters recommended modifications to certain proposed amendments or recommended additional changes not included in the proposed amendments. Staff's responses to the submitted comments are provided in Tab B.

C) Recommended Changes to the Proposed Rule

Based on the technical comments received, discussions with interested parties, and a further review of the standard, staff recommends three changes to the proposed rule as discussed below:

1. One commenter recommended that the definition for "track bicycles" should be clarified to indicate whether they require braking systems. Staff agrees with the commenter regarding the definition for a "track bicycle." As proposed, the definition states that only track bicycles specifically intended for competitive velodrome use are excepted from the requirements of the regulation. These specific track bicycles do not have hand brake levers or brake calipers. Staff recommends in its draft final rule that the definition be modified as follows to reflect this:

   § 1512.2 Definitions.
   (d) *Track bicycle* means a bicycle designed and intended for sale as a competitive velodrome machine having no brake levers or calipers, single crank-to-wheel ratio, and no free-wheeling feature between the rear wheel and the crank.

2. One commenter recommended modifying the text for the proposed change to the wheel hub requirement to clarify the excepted material for the frame and fork emboss requirement. The commenter recommended using the term "fiber-reinforced plastics" instead of the term "carbon fiber materials" in the proposed exception for quick-release clamping action to emboss the frame or fork. CPSC staff agrees that "fiber-reinforced plastics" is a more accurate term than "carbon fiber materials" and recommends in its draft final rule that the requirement be modified as follows:

   § 1512.12 Requirements for wheel hubs.
   (b) *Quick-release devices.* Lever-operated, quick-release devices shall be adjustable to allow setting the lever position for tightness. Quick-release levers shall be clearly visible to the rider and shall indicate whether the levers are in a locked or unlocked position. Quick-release clamp action shall emboss the frame or fork when locked, except on fiber-reinforced plastics.

3. One commenter recommended modifying the proposed change to the seat post requirement, which excepted all bicycles with integrated seat masts from the minimum insertion depth requirement. CPSC staff agrees that the proposed exception removes the requirement for bicycles with integrated seat masts to have a mark or means for ensuring that the seat or seat post is assembled properly. Additionally, staff suggests that even bicycles that require the seat posts or masts to be cut should have some means of ensuring that the seat or seat post is installed properly. Staff recommends in its draft final rule that the requirement be modified as follows:

§ 1512.15 Requirements for seat.

(b) *Seat post.* The seat post shall contain a permanent mark or ring that clearly indicates the minimum insertion depth (maximum seat-height adjustment); the mark shall not affect the structural integrity of the seat post. This mark shall be located no less than two seat-post diameters from the lowest point on the post shaft, and the post strength shall be maintained for at least a length of one shaft diameter below the mark. This requirement does not apply to bicycles with integrated seat masts; however, a permanent mark or other means to indicate clearly that the seat or seat post is safely installed shall be provided.

D) Final Regulatory Analysis (Tab C)

The Federal Hazardous Substances Act (FHSA) specifies that the Commission shall not promulgate a regulation unless it has prepared a final regulatory analysis of the regulation, including amendments to regulations promulgated under the FHSA. The final regulatory analysis must contain "a description of the potential benefits and potential costs of the regulation, including costs and benefits that cannot be quantified in monetary terms…." Additionally, under the Regulatory Flexibility Act of 1980, the Commission must address the potential economic effects of a proposed rule on small businesses and other small entities. These issues are addressed in the Final Regulatory Analysis at Tab C.

E) Environmental Impact

The final rule falls within the scope of the Commission's environmental review regulations at 16 CFR § 1021.5(c)(1), which provide a categorical exclusion from any requirement for the agency to prepare an environmental assessment or environmental impact statement for amendments of rules or safety standards that provide design or performance requirements for products.

F) Effective Date of Final Rule

In the NPR, the CPSC proposed an effective date of 30 days from publication of the final rule in the Federal Register. No comments were received regarding the proposed effective date; therefore, CPSC staff believes 30 days is reasonable and adequate for implementation of the rule.

G) Conclusions

After review of the comments received in response to the NPR, CPSC staff recommends, in its draft final rule, three changes to the proposed amendments to the bicycle regulation:

1. In the definitions, clarify that track bicycles have no brake levers or calipers.
2. Revise the term used in the wheel hub quick-release requirement from "carbon fiber material" to "fiber-reinforced plastics."

3. Revise the requirement for seat posts on bicycles with integrated seat masts to require a mark or means to ensure that the seat or seat post is installed safely.

TAB A

75 Federal Register Notice 67043
Monday, November 1, 2010

http://www.cpsc.gov/businfo/frnotices/fr11/bikecomm.pdf

TAB B

Staff Responses to Public Comments

UNITED STATES
CONSUMER PRODUCT SAFETY COMMISSION
4330 EAST WEST HIGHWAY
BETHESDA, MD 20814

This document has been electronically approved and signed.

Memorandum

Date: April 25, 2011

TO : Briefing Package

THROUGH: Erlinda M. Edwards, Acting Associate Executive Director, Directorate for Engineering Sciences
Mark E. Kumagai, Director, Division of Mechanical Engineering Directorate for Engineering Sciences

FROM : Vincent J. Amodeo, Mechanical Engineer
Directorate for Engineering Sciences
Jan Carlson, Attorney, Regulatory Affairs Division
Office of General Counsel

SUBJECT : Staff Responses to Comments on the Notice of Proposed Rulemaking for *Requirements for Bicycles*

I. *Introduction*

Staff received 13 comment submissions, including 10 from individuals, 1 from Nirve Sports, 1 from Consumers Union, and 1 from the Bicycle Product Suppliers Association (BPSA), regarding the Notice of Proposed Rulemaking for Bicycles (Docket No. CPSC-2010-0104). This memo provides the staff's responses to the comments.

II. Responses to Comments

a. Individuals

There were 10 comment submissions received from individuals.

1. Three commenters generally supported the proposed changes, without any concerns.

2. One commenter was in general agreement, but expressed concern over lead content in children's bicycles.

CPSC Staff Response:

Lead in children's bicycles is not covered in the bicycle regulation and, thus, is outside the scope of this rulemaking. A bicycle that is a "children's product," as defined by section 3(a)(2) of the CPSA, is subject to the lead content limit covered in section 101(a)(2) of the CPSIA.

3. One commenter made remarks unrelated to the proposed rule, but seemed opposed to any regulation, in general.

4. One commenter was in general agreement, and noted that the proposed rule change for seat heights is one that needs to be passed as soon as possible.

CPSC Staff Response:

The proposed rule does not change the existing requirement for seat height marking.

5. One commenter was in general support of the changes, but urged the CPSC to go further in its efforts to fully reform 16 C.F.R. part 1512 so that the regulation adequately addresses the needs of today's bicycles.

CPSC Staff Response:

As staff stated in the briefing package associated with the proposed rule, a comprehensive review of the bicycle regulations cannot be accomplished in the timeframe necessary for implementing the testing and certification requirements of section 14 of the CPSA. Accordingly, the proposed rule made only limited amendments to 16 C.F.R. part 1512, primarily to facilitate testing and certification of bicycles in accordance with section 14 of the CPSA.

6. One commenter stated that the braking requirements are inadequate and need to be changed. The commenter gave no specific recommendations.

CPSC Staff Response:

New test requirements could not be developed under the current project scope but may be considered in the future. As such, additional requirements for braking were not considered at this time.

7. One commenter was in general support of the changes, but recommended two changes originally proposed by the BPSA:
   (1) clipless pedals should be excepted from the requirements for treads and reflectors; and
   (2) the requirements for derailleur guards should be adjusted to accommodate 11-speed drive trains and nontraditional wheel designs.

CPSC Staff Response:

Previously, staff expressed the opinion that clipless pedals are primarily aftermarket products that are not subject to the regulation. Because they are not sold as original equipment on new, complete bicycles, clipless pedals are not required to have treads or reflectors. In order to allow original equipment pedals on bicycles without tread or

reflectors, staff would have to evaluate the safety impact of allowing bicycles to be sold with no pedal reflectors.

Additionally, staff stated that the typical method for bicycle manufacturers to comply with the derailleur guard requirement is to install a plastic disk between the inside of the rear cassette inner gear and the wheel spokes. However, a method is not specified for meeting the derailleur guard requirement. Should the derailleur become bent or otherwise damaged, it could impact the spokes and prevent the rear wheel from rotating if no guard is present. In order to relax or modify the present requirement, staff would need to evaluate the safety impact of changing the derailleur guard requirement.

8. One commenter was in general support of the changes, but recommended that the definition of "track bicycles" be clarified to state whether they require braking systems.

CPSC Staff Response:

Staff agrees with the commenter regarding the definition "track bicycle." The proposed rule clarifies that only track bicycles specifically intended for competitive velodrome use are excepted from the requirements of the regulation. These specific track bicycles do not have hand brake levers or brake calipers. Staff recommends in its draft final rule that the definition be modified, as follows, to reflect this:

> **§ 1512.2 Definitions.** (d) *Track bicycle* means a bicycle designed and intended for sale as a competitive velodrome machine having no brake levers or calipers, single crank-to-wheel ratio, and no free-wheeling feature between the rear wheel and the crank.

b. Manufacturer/Retailer

A bicycle manufacturer and retailer submitted remarks unrelated to the proposed rule. The comments related to updating a typographical error contained in a regulatory summary for bicycles found on the CPSC website, which has been addressed separately.

c. Consumer Group

A consumer advocacy organization was in general support of the changes, but encouraged the CPSC to focus, in the future, on two additional bicycle-related safety concerns:

(1) consider material fatigue, particularly regarding durability tests for frames, forks, seat posts, handlebar stems, and cranks; and
(2) address braking performance; specifically, require a wet braking performance test, a front brake modulation test, and a brake fade test.

CPSC Staff Response:

As stated previously, development of additional requirements could not be addressed under the scope of the current revision but may be included in a future review of the bicycle regulation.

d. Trade Association

A trade association commented on four issues regarding the bicycle regulation.

1. As they had in their original submission regarding the regulation, the trade association recommended modifying the brake lever grip dimension. The regulation specifies a maximum outside dimension of 89 millimeters from the inside of the handlebar to the outside of the brake lever at any point between the pivot point of the lever to the midpoint of the lever. The commenter stated that certain time-trial bicycles and "drop bar" bicycles with integrated shift/brake levers do not meet the current requirement. The commenter would change the requirement to 100 millimeters.

CPSC Staff Response:

While CPSC staff is aware that brake levers that do not meet the current dimensional requirement have been in use by the public for several years—primarily on high-end road bicycles—staff has not studied the impact of modifying this requirement for all bicycles. In order to relax the present requirement, the Commission would need to determine that there is no detriment to safety from increasing this dimension.

2. As they had in their original submission regarding the regulation, the commenter recommended excepting clipless pedals from the requirements for treads and reflectors.

CPSC Staff Response:

Previously, staff expressed the opinion that clipless pedals are primarily aftermarket products that are not subject to the regulation. Because they generally are not sold as original equipment on new, complete bicycles, they are not required to have treads or reflectors. In order to allow original equipment pedals on bicycles without tread or reflectors, staff would have to evaluate the safety impact of allowing bicycles to be sold with no pedal reflectors.

3. The commenter recommended modifying the text of the proposed change to the wheel hub requirement to clarify the excepted material for the frame and fork emboss requirement. They recommend using the term "fiber-reinforced plastics" instead of the term "carbon fiber materials" in the proposed exception for quick-release clamping action to emboss the frame or fork.

CPSC Staff Response:

CPSC staff agrees that "fiber-reinforced plastics" is a more accurate and broader term than "carbon fiber materials" and recommends in its draft final rule that the proposed requirement be modified as follows:

§ 1512.12 Requirements for wheel hubs

(b) *Quick-release devices*. Lever-operated, quick-release devices shall be adjustable to allow setting the lever position for tightness. Quick-release levers shall be clearly visible to the rider and shall indicate whether the levers are in a locked or unlocked position. Quick-release clamp action shall emboss the frame or fork when locked, except on fiber-reinforced plastics.

4. The commenter recommended modifying the proposed change to the seat post requirement, which excepted all bicycles with integrated seat masts from the minimum insertion depth requirement. They recommend modifying the requirement to specify that the manufacturer provide a permanent mark or other means to ensure that the seat or seat post is installed properly on frames with integrated seat masts, except on bicycles with seat posts that are cut to fit a specific rider. For these bicycles, they indicate that there is no practical way to determine placement of the marking.

CPSC Staff Response:

The proposed exception for bicycles with integrated seat masts was intended to clarify that these bicycles do not have traditional seat posts inserted into the frame, and therefore the seat post does not require a minimum insertion mark. However, CPSC staff agrees that the proposed exception removes the requirement for bicycles with integrated seat masts to have a mark or means of ensuring that the seat or seat post is properly installed. Staff recommends in its draft final rule that the proposed requirement be modified as follows:

§ 1512.12 Requirements for seat

(b) *Seat post.* The seat post shall contain a permanent mark or ring that clearly indicates the minimum insertion depth (maximum seat-height adjustment); the mark shall not affect the structural integrity of the seat post. This mark shall be located no less than two seat-post diameters from the lowest point on the post shaft, and the post strength shall be maintained for at least a length of one shaft diameter below the mark. This requirement does not apply to bicycles with integrated seat masts; however, a permanent mark or other means to clearly indicate that the seat or seat post is safely installed shall be provided.

TAB C

Final Regulatory Analysis

UNITED STATES
CONSUMER PRODUCT SAFETY COMMISSION
4330 EAST WEST HIGHWAY
BETHESDA, MD 20814

Memorandum

Date: February 25, 2011

TO : Vincent J. Amodeo, Mechanical Engineering
Directorate for Engineering Sciences

THROUGH : Gregory B. Rodgers, Ph.D., Associate Executive Director,
Directorate for Economic Analysis
Deborah V. Aiken, Ph.D., Senior Staff Coordinator,
Directorate for Economic Analysis

FROM : Charles L. Smith, Directorate for Economic Analysis

SUBJECT : Final Regulatory Analysis: Amendments to the *Requirements for Bicycles*, 16 C.F.R. Part 1512

The Consumer Product Safety Commission (CPSC) is considering the promulgation of technical amendments to a standard issued under the Federal Hazardous Substances Act (FHSA). The amendments involve the *Requirements for Bicycles*, 16 C.F.R. part 1512. The changes include adding and clarifying terms and requirements necessary for bicycle manufacturers to conduct testing and certification, and excepting certain types of bicycles or components from testing under specific sections of the regulation. Most of the amendments are in response to the bicycle manufacturers' requests for clarification of the standard, and they do not change any of the standard's acceptance criteria.

Amendments to the *Requirements for Bicycles*

The Commission is considering the issuance of 12 changes to 16 C.F.R. part 1512, *Requirements for Bicycles*. These changes, and CPSC staff's rationale for each change, are as follows:

1. § 1512.2 (b) – *Definitions* - Exempt recumbent bicycles from the definition of sidewalk bicycles.

   Recumbent bicycles are adult bicycles ridden in a seated position with the legs extended forward. In general, recumbent bicycles have low seats with high backs. As such, recumbent bicycles should be exempted from the definition of sidewalk bicycles, which are defined by a seat height of no more than 635 mm (25.0 inches).

2. § 1512.2 (d) – *Definitions* - Clarify that the definition for a track bicycle should be modified to a bicycle intended for competitive *velodrome* racing, having no brake

calipers or levers, and a fixed-gear crank drive. These bicycles may have tubular or clincher tires.

This change makes it clear that specialized bicycles intended for racing on a closed-course velodrome track are exempt from the regulation. The current standard specifies tubular tires only in the definition of a track bicycle, but improvements in clincher tires permit their use on track bicycles. If the definition is not modified, track bicycles with clincher tires would be subject to the bicycle regulation. This change makes clear exactly which type of bicycle is exempt from the regulation.

3. § 1512.2 - *Definitions* - Add a definition for *recumbent bicycle* as a bicycle in which the rider sits in a reclined position with the feet extended forward.

   Although recumbent bicycles are subject to the regulation, they were not commercially available when the standard was written. Because of their special configuration, clarification of certain requirements is needed for recumbent bicycles to be certified.

4. § 1512.4 (b) **–** *Sharp edges* **-** Clarify that the sharp edge requirement only applies to *assembled* bicycles.

   Bicycles that need to be assembled by an adult or retail store may contain sharp edges in the unassembled state that would not present a hazard to the rider when the bicycle is fully assembled.

5. § 1512.4 (i) – *Control cable ends* - Clarify that the control cable ends requirement applies to *accessible* control cable ends.

   A bicycle may have control cable ends that are not exposed, posing no hazard to the user, and need not be provided with protective caps.

6. § 1512.6 (a) – *Handlebar stem insertion mark* - Clarify that the handlebar stem minimum depth insertion mark requirement applies to *quill-type* stems only.

   Modern threadless bicycle stems clamp around the fork steerer tube instead of being inserted into the steerer tube and therefore, do not require a minimum insertion depth mark.

7. § 1512.6 (c) – *Handlebars* - Exempt recumbent bicycles from the handlebar height requirement.

   Some recumbent bicycles may have handlebars higher than 406 mm (16 inches) above the seat surface as a requirement of their nontraditional rider position and design and need to be exempted from the handlebar height requirement.

8. § 1512.12 (b) – *Wheel hub quick-release devices* - Exempt forks made from fiber-reinforced plastics from the embossment requirement for the quick-release device.

   Fiber-reinforced plastics should not be nicked or indented or they can be weakened, thereby reducing their strength and safety.

9. § 1512.15 (a) – *Seat limitation* - Exempt recumbent bicycles from seat limitation requirement.

   Because of the high-back seat design for the reclined rider, recumbent bicycles should be exempted from the seat limitation requirement that no part of the seat be more than 125 mm (5.0 inches) above the top of the seat surface.

10. § 1512.15 (b) – *Seat post minimum insertion depth mark* - Exempt bicycles with integrated seat masts from the seat post minimum insertion depth mark requirement. Instead, bicycles with integrated seat masts are required to have a permanent mark or other means to indicate clearly that a seat or seat post is safely installed.

    Integrated seat masts are found on some bicycles with carbon fiber frames. These bicycles do not have seat posts; instead, the integrated seat mast extends upward from the frame, and the seat clamping device clamps around the mast. The seat post is clamped around the seat mast instead of being inserted into the seat tube, and therefore, does not require a minimum insertion depth mark.

11. § 1512.18 (k)(1) – *Fork test* - Clarify that the fork test method does not require the fork to be deflected to 2.5 inches to accomplish this test. The required energy may be absorbed at any deflection up to 2.5 inches.

    This clarification of the test method will allow carbon fiber forks to be tested to the standard. Carbon fiber forks are far more rigid than steel and aluminum forks. While a carbon fiber fork is as strong as or stronger than one made from metal, it cannot bend a large degree without fracture like a metal fork. Staff believes the original intent of the fork test was to deflect the fork *no more than* 2.5 inches while absorbing the specified energy. The proposed change does not modify the acceptance criteria or reduce safety.

12. § 1512.18 (n)(2)(vii) – *Reflector performance test* - Correct typographical errors in the equations for the reflector performance test. Equal signs are missing from the equations, and erroneous minus signs are included.

Comments Received in Response to the Notice of Proposed Rulemaking

The CPSC received 13 comments regarding the Notice of Proposed Rulemaking for bicycles. Six commenters expressed their support of the proposed amendments to the bicycle regulation; some recommended a more comprehensive review. Two commenters

expressed views on issues that were unrelated to the draft revisions. Five commenters recommended modifications to certain proposed amendments or recommended additional changes not included in the proposed amendment. Three of these comments led staff to suggest wording changes to the amendments as published in the Notice of Proposed Rulemaking. Other comments suggested revisions that are beyond the scope of the current rulemaking and will be addressed in a future review of the bicycle regulation. None of the comments received specifically addressed economic issues associated with the amendments.

Requirements that Must Be Met Under the FHSA and Other Governing Laws

The FHSA specifies that the Commission shall not promulgate a regulation unless it has prepared a final regulatory analysis of the regulation, including amendments to regulations promulgated under the FHSA. The final regulatory analysis must contain "a description of the potential benefits and potential costs of the regulation, including costs and benefits that cannot be quantified in monetary terms . . .." Additionally, under the Regulatory Flexibility Act of 1980, the Commission must address the potential economic effects of a proposed rule on small businesses and other small entities. Also, under the National Environmental Policy Act (NEPA), the Commission must consider the potential environmental effects of the proposed rule.

Potential Benefits and Costs

The amendments would not materially affect the types and classes of bicycles available for consumer use; consequently, they are not expected to result in any change in the number of injuries or deaths. Although these amendments are not expected to result in additional benefits associated with the *Requirements for Bicycles* in the form of further reductions in deaths or injuries, they are expected to provide needed clarifications that will facilitate testing and certification of conforming products. For example, § 1512.18 (k)(1) makes it clear that forks do not have to be deflected to 2.5 inches when the test force is applied. Because carbon fiber forks would have to be weaker to be deflected 2.5 inches, the clarification ensures that the stronger forks can continue to be used. Similarly, the amendments are not expected to increase costs to manufacturers. For the most part, the changes are clarifications that make it possible for manufacturers to submit bicycle models for certification testing, and, in most cases, the revisions would provide exemptions from selected provisions of the standard for bicycles or components with specific characteristics. No additional testing or recordkeeping requirements are contemplated as a result of the amendments. Any changes in costs are expected to be cost savings for bicycle manufacturers from the clarifications and exemptions that would result from the amendments.

Regulatory Flexibility Act

The Regulatory Flexibility Act requires that the Commission consider whether a rule would have a significant economic effect on a substantial number of small entities, including small businesses and small government entities. Based on available

information, there would be little or no effect on small businesses because the amendments will not result in product modifications in order to comply, and will not result in additional testing or recordkeeping burdens. If anything, the clarifications and exemptions arising from the amendments will likely result in cost savings to small businesses. Therefore, the Commission could conclude that the amendments to the *Requirements for Bicycles* are not expected to have a significant economic effect on a substantial number of small entities.

National Environmental Policy Act

The final rule falls within the scope of the Commission's environmental review regulations at 16 CFR § 1021.5(c)(1), which provide a categorical exclusion from any requirement for the agency to prepare an environmental assessment or environmental impact statement for amendments of rules or safety standards that provide design or performance requirements for products.

TAB D

Draft Federal Register Notice

Requirements for Bicycles – Final Rule

Billing Code 6355-01-P

CONSUMER PRODUCT SAFETY COMMISSION

CPSC Docket No. CPSC-2010-0104

16 CFR Part 1512

RIN 3041-AC95

Requirements for Bicycles

AGENCY: Consumer Product Safety Commission.

ACTION: Final rule.

SUMMARY: The Consumer Product Safety Commission ("CPSC," "Commission," or "we") is amending its bicycle regulations. The amendments make minor changes to the existing regulations to reflect new technologies, designs, and features in bicycles by clarifying that certain provisions or testing requirements do not apply to specific bicycles or bicycle parts. The amendments also clarify several ambiguous and confusing provisions. The final rule also corrects typographical errors and deletes an outdated reference.

DATES: The rule is effective [INSERT DATE 30 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER.]

FOR FURTHER INFORMATION CONTACT: Vincent J. Amodeo, Mechanical Engineer, Directorate for Engineering Sciences, U.S. Consumer Product Safety Commission, 4330 East West Highway, Bethesda, MD 20814; e-mail vamodeo@cpsc.gov; telephone 301-504-7570.

SUPPLEMENTARY INFORMATION:

I. Background

CPSC regulations, at 16 CFR part 1512, establish requirements for bicycles pursuant to the Federal Hazardous Substances Act. The regulations were first promulgated in 1978 (43 FR 60034 (Dec. 22, 1978)), with minor amendments in 1980 (45 FR 82627 (Dec. 16, 1980)), 1981 (46 FR 3204 (Jan. 14, 1981)), 1995 (60 FR 62990 (Dec. 8, 1995)), and 2003 (68 FR 7073 (Feb. 12, 2003); 68 FR 52691 (Sept. 5, 2003)).

In recent years, there have been technological changes in bicycle design and in the materials used to manufacture bicycles that have caused some bicycle manufacturers to question the applicability of a particular CPSC regulation or to seek changes to the regulations. Additionally, the enactment of the Consumer Product Safety Improvement Act of 2008 (CPSIA), Pub. L. 110-314, 122 Stat. 3016, has resulted in new testing and certification requirements for children's products.

In the Federal Register of November 1, 2010 (75 FR 67043), we issued a proposed rule that would amend 16 CFR part 1512. The proposed rule would make minor changes to the existing regulations to reflect new technologies, designs, and features in bicycles, by clarifying that certain provisions or testing requirements do not apply to specific bicycles or bicycle parts. The proposal also would clarify several ambiguous and confusing provisions, correct typographical errors, and delete an outdated reference.

The proposed rule also was intended to facilitate the testing and certification requirements of section 14 of the Consumer Product Safety Act (CPSA), 15 U.S.C. 2063, as amended by section 102 of the CPSIA. Section 14 of the CPSA requires manufacturers and private labelers of a product subject to a CPSC rule, ban, standard, or regulation to certify compliance of the product with such rule, ban, standard, or

regulation. Section 14(a)(1) of the CPSA requires that certifications for non-children's products be based on a test of each product or upon a reasonable testing program. Section 14(a)(2) of the CPSA requires that certifications for children's products be based on tests conducted by a CPSC-accepted third party conformity assessment body (also commonly referred to as a "third party laboratory" or simply a "laboratory"). Under section 14(a)(3) of the CPSA, the requirement to third-party test children's products applies to products manufactured more than 90 days after the CPSC has established and published notice of the requirements for accreditation of third party conformity assessment bodies to assess conformity with a particular rule. In the Federal Register of September 2, 2009 (74 FR 45428), the CPSC published a notice of requirements for accreditation of third party conformity assessment bodies to assess conformity with 16 CFR part 1512.

However, in the Federal Register of February 9, 2009 (74 FR 6396), the Commission published a notice announcing that it had stayed, for one year, the testing and certification requirements of section 14 of the CPSA, as applied to 16 CFR part 1512, and most other CPSC regulations. The stay was intended to give the CPSC time to address many issues raised by the CPSIA's testing and certification requirements (Id. at 6397). Later, in the Federal Register of December 28, 2009 (74 FR 68588), the Commission published a notice that revised the terms of the stay. The Commission maintained the stay on the testing and certification requirements for the bicycle regulations until May 17, 2010, because there was insufficient laboratory capacity for third party testing of bicycles at that time (Id. at 68590). The Commission invited bicycle

manufacturers and laboratories to petition the Commission for additional relief if the extension of the stay proved insufficient.

On April 1, 2010, the Bicycle Products Suppliers Association (BPSA), which describes itself as an association of suppliers of bicycles, parts, accessories, and services who serve specialty bicycle retailers, petitioned the Commission for an additional extension of the stay. (The petition can be found at www.regulations.gov by searching for the docket number for this rulemaking.) The BPSA contended that there still was insufficient laboratory capacity to handle testing of children's bicycles. It also asserted that 16 CFR part 1512 is out of date in many respects, stated its understanding that the CPSC may commence rulemaking to revise part 1512 in the near future, and urged the Commission to begin such rulemaking. The BPSA suggested that the Commission maintain the stay on testing and certification of bicycles until such a rulemaking concludes, or for an additional year.

On May 3, 2010, CPSC staff met with representatives of the BPSA to discuss the petition. (A summary of the meeting can be found at http://www.cpsc.gov/library/foia/meetings/mtg10/bpsa102.pdf.). On June 17, 2010, the Commission published a notice in the Federal Register extending the stay on testing and certification requirements for bicycles until August 14, 2010, with two exceptions (75 FR 34360). First, because laboratory capacity, at that time, was still insufficient to assess compliance with the reflector requirements at 16 CFR § 1512.16, the Commission extended the stay, as it related to bicycle reflectors, until November 14, 2010 (Id.). The Commission allowed the additional 3-month period for the development of CPSC-accepted laboratory capacity for bicycle reflector testing. Second, the Commission

excluded bicycles with non-quill-type stems from the requirement to certify compliance with the handlebar stem insertion mark requirement at 16 CFR § 1512.6(a); bicycles with non-quill-type stems may not be able to comply with the insertion mark requirement.

(A stem is the part of a bicycle that connects the handlebars to the "steerer" or upper part of the bicycle fork [the part of the bicycle that holds the front wheel and can turn to steer the bicycle]. A quill-type stem is a stem that is inserted into the steerer. Most older bicycles use a quill-type stem, but newer bicycles may use other means to connect the stem to the fork. For example, a "threadless" stem clamps onto the outside of the steerer [rather than having the stem go inside the steerer], and so we will refer to such other types of stems as "non-quill-type stems.")

In its letter responding to the BPSA's petition, the Commission communicated its decision to extend the stay until August 14, 2010, with the two exceptions for reflector testing and stems. We stated that we are aware that 16 CFR part 1512 does not adequately address some new technologies, designs, or materials, and we asked that manufacturers who believe that they are unable to certify current designs to 16 CFR part 1512 provide the Commission with specific information regarding which provisions of the current regulations are problematic, which models or classes of bicycles are affected, and an explanation of the issue.

In response, on June 4, 2010, the BPSA sent a chart to the CPSC identifying areas in the bicycle regulations that the BPSA considered problematic for certification. This chart differed slightly from a chart that the BPSA had provided informally to CPSC staff earlier in 2010. We considered both charts in the process of developing the proposed

rule. (Both charts can be found at www.regulations.gov by searching for the docket number for this rulemaking.)

Consequently, in the Federal Register of November 1, 2010 (75 FR 67043), we published a notice of proposed rulemaking recommending several changes to the bicycle regulations. The proposed changes were meant to address some of the issues raised by the BPSA, and ease the burden on bicycle manufacturers by exempting specific bicycles or bicycle parts from certain requirements, clarifying ambiguous and confusing provisions, correcting several typographical errors, and deleting an outdated provision. The preamble to the proposed rule also acknowledged that bicycle technologies, designs, and features have changed dramatically since 16 CFR part 1512 was originally promulgated, but stated that we cannot conduct a comprehensive review of the bicycle regulations in the timeframe that is necessary for implementing the testing and certification requirements of section 14 of the CPSA (75 FR at 67044). Accordingly, the proposed rule would make only limited amendments to 16 CFR part 1512 to facilitate testing and certification of bicycles in accordance with section 14 of the CPSA.

II. Comments on the Proposed Rule, the CPSC's Responses, and Description of the Final Rule

A. Introduction

We received comments from 13 submitters regarding the proposed rule. We received comments from individuals, a bicycle manufacturer and retailer, a consumer advocacy organization, and the BPSA. In brief, several commenters supported the rule, whereas other commenters either sought a more comprehensive review of the bicycle

regulations, or opposed the existence of any standard governing bicycle safety. Other commenters sought changes that were specific to certain bicycle parts, such as brakes and clipless pedals. Several commenters addressed topics that were outside the scope of the rulemaking, such as suggesting changes to information on the CPSC's website.

We describe and respond to the comments in section II of this document and also describe the final rule. To make it easier to identify the comments and our responses, the word "Comment," in parentheses, will appear before the comment's description, and the word "Response," in parentheses, will appear before our response. We also have numbered each comment to help distinguish between different comments. The number assigned to each comment is purely for organizational purposes and does not signify the comment's value, or importance, or the order in which it was received.

B. Definitions (§ 1512.2)

1. Sidewalk Bicycles (§ 1512.2(b))

The existing regulation, at § 1512.2(b), defines a "sidewalk bicycle" as "a bicycle with a seat height of no more than 635 mm (25.0 in); the seat height is measured with the seat adjusted to its highest position." The proposed rule would amend the definition of sidewalk bicycle by adding a sentence stating that recumbent bicycles are not considered sidewalk bicycles. Although some recumbent bicycles may have seats below the 635 millimeter height, recumbent bicycles do not share other features, or the intended riders, of sidewalk bicycles. This will have the effect of clarifying which requirements are applicable to recumbent bicycles, which were not available when the standard was first promulgated.

We received no comments on this provision and have finalized it without change.

2. Track Bicycles (§ 1512.2(d))

The existing regulation, at § 1512.2(d), defines a "track bicycle" as "a bicycle designed and intended for sale as a competitive machine having tubular tires, single crank-to-wheel ratio, and no free-wheeling feature between the rear wheel and the crank." Track bicycles are not subject to the requirements of 16 CFR part 1512. The proposed rule would amend the definition of track bicycle to further clarify which bicycles are not subject to the regulations. The proposed rule recommended adding the word "velodrome" between "competitive" and "machine," to clarify that a track bicycle is one intended for competitive velodrome racing. (A "velodrome" is an arena that has a banked track for bicycle racing.)

The proposed rule also recommended deleting the term "tubular tires." Improvements in clincher tires in recent years permit their use on track bicycles; therefore, a definition restricted to bicycles with tubular tires is no longer accurate and would have the effect of subjecting track bicycles with clincher tires to the regulations. (In very general terms, clincher tires are the type of tires associated with most bicycles and feature an inner tube and an outer tire that makes contact with the rims of a bicycle wheel at each edge [called a "bead"]. Tubular tires, in contrast, do not have edges that contact the rim; instead, tubular tires are attached to the rims using glue or tape.)

(Comment 1) - One commenter suggested that we consider whether track bicycles need or should have a braking system.

(Response 1) – Track bicycles, which are used by professionals in competitive racing, do not have brakes. Thus, in the final rule, we have revised the definition to state that a "track bicycle" is "a bicycle designed and intended for sale as a competitive

velodrome machine having no brake levers or calipers, single crank-to-wheel ratio, and no free-wheeling feature between the rear wheel and the crank."

3. Recumbent Bicycle (Proposed § 1512.2(g))

Proposed § 1512.2(g) would define a "recumbent bicycle" as "a bicycle in which the rider sits in a reclined position with the feet extended forward to the pedals."

We received no comments on this provision and have finalized it without change.

C. Mechanical Requirements (§ 1512.4)

Section 1512.4 establishes various mechanical requirements for bicycles. Section 1512.4(b) prohibits "unfinished sheared metal edges or other sharp parts on bicycles that are, or may be, exposed to hands or legs." The proposed rule would add the word, "assembled" before "bicycles," to clarify that the prohibition on sharp edges does not apply to a bicycle still needing assembly when it is delivered to the consumer or retail store. Unassembled bicycles may contain sharp edges that are not present when the product is fully assembled.

The proposed rule also would correct a typographical error in § 1512.4(b). The wording should be "burrs or spurs" rather than "burrs of spurs" so that the sentence reads: "so as to remove any feathering of edges, or any burrs or spurs caused during the shearing process."

Section 1512.4(i) requires that the ends of all control cables have protective caps or otherwise be treated to prevent unraveling. The proposed rule would add the word "accessible" between the words "all" and "control cables," to clarify that only accessible control cable ends are subject to the requirement regarding protective caps or prevention of unraveling. In other words, control cable ends housed within the bicycle frame or

component would not need to be covered with protective caps or otherwise treated to prevent unraveling.

We received no comments on this provision and have finalized it without change.

D. Requirements for Steering System (§ 1512.6)

Section 1512.6(a) requires that the bicycle handlebar stem have a permanent ring or mark to indicate the minimum insertion depth of the handlebar stem into the fork. It also requires that the insertion mark not affect the structural integrity of the stem, not be less than 2 1⁄2 times the stem diameter from the lowest point of the stem, and that the stem strength be maintained for at least a length of one shaft diameter below the mark.

The proposed rule would revise the opening words of paragraph (a) from: "[t]he handlebar stem shall" to "[q]uill-type handlebar stems shall," to clarify that this requirement only applies to bicycles having quill-type stems. Because non-quill-type stems do not get inserted into the stem, there is no need for them to have an insertion depth mark. This aspect of the proposal would codify the CPSC policy announced in the June 17, 2010 stay notice, that non-quill-type stems would be excluded from the requirement to certify compliance with § 1512.6(a).

Section 1512.6(c) specifies that handlebars must allow comfortable and safe control of the bicycle and that handlebar ends be symmetrically located with respect to the longitudinal axis of the bicycle and "no more than 406 mm (16 in) above the seat surface when the seat is in its lowest position and the handlebar ends are in their highest position." The proposed rule would create an exception for recumbent bicycles because the handlebars of recumbent bicycles may exceed this regulatory maximum, depending upon their design configuration.

We received no comments on this provision and have finalized it without change.

E. Requirements for Wheel Hubs (§ 1512.12(b))

Currently, § 1512.12(b) states that, with respect to quick-release devices, the quick-release clamp action "shall emboss the frame or fork when locked." The proposed rule would create an exception for carbon fiber material. The requirement for a quick-release clamp action to emboss a frame or fork when locked is appropriate when bicycle frames are made using steel or aluminum. Modern technology, however, makes it possible to create bicycle frames using carbon fiber material. Carbon fiber is stronger than aluminum and steel, but embossing (or indenting) a carbon fiber frame or fork can weaken the material. To avoid such an illogical result (*i.e.*, of intentionally weakening a carbon fiber frame or fork), the proposal would create an exception for carbon fiber material.

(Comment 2) – One commenter agreed with the proposal, but asserted that the more accurate way to describe this material (carbon fiber material) is to use the term "fiber-reinforced plastics."

(Response 2) – We agree with the commenter and have revised the final rule accordingly.

F. Requirements for Seat (§ 1512.15)

Section 1512.15 establishes various requirements for bicycle seats. Section 1512.15(a) imposes a limitation on seat height, stating: "[n]o part of the seat, seat supports, or accessories attached to the seat shall be more than 125 mm (5.0 in) above the top of the seat surface at the point where the seat surface is intersected by the seat post axis."

Section 1512.15(b) requires seat posts to contain a "permanent mark or ring that clearly indicates the minimum insertion depth (maximum seat-height adjustment)" and that the mark not affect the structural integrity of the seat post. (A seat post is a post on which the bicycle seat or saddle rests; a traditional seat post is inserted into the bicycle frame and can be moved up or down to accommodate the rider's size.) Section 1512.15(b) also requires the mark to be "located no less than two seat-post diameters from the lowest point on the post shaft, and the post strength shall be maintained for at least a length of one shaft diameter below the mark."

The proposed rule would create an exception for recumbent bicycles from the seat height limitation in § 1512.15(a). Recumbent bicycles are designed for reclined riding, so the seats on recumbent bicycles tend to have substantial seat backs. This exception would enable recumbent bicycles to retain their high seat-back design without violating § 1512.15(a).

The proposed rule also would create an exception to the requirement that seat posts contain a permanent mark or ring to indicate the minimum insertion depth for bicycles with integrated seat masts. Integrated seat masts are part of the bicycle frame; thus, they do not get inserted in a seat post, therefore, no insertion depth mark is possible.

(Comment 3) – One commenter said that bicycles with integrated seat masts should continue to have a marking that allows retailers and consumers to easily determine that the seat and seat post are safely installed.

(Response 3) – We agree that integrated seat masts with a marking would allow retailers and consumers to easily determine that a seat is safely assembled. A mark on the product will reassure the public that the seat is safe. Thus, we have revised the final

rule to state that, "(t)he seat post shall contain a permanent mark or ring that clearly indicates the minimum insertion depth (maximum seat-height adjustment); the mark shall not affect the structural integrity of the seat post. This mark shall be located no less than two seat-post diameters from the lowest point on the post shaft, and the post strength shall be maintained for at least a length of one shaft diameter below the mark. This requirement does not apply to bicycles with integrated seat masts; however, a permanent mark or other means to clearly indicate that the seat or seat post is safely installed shall be provided."

(Comment 4) - One commenter requested that seat posts that are cut to fit be excluded from the marking requirement because there is no way to determine where the mark should be.

(Response 4) - We decline to grant the commenter's request to exclude from the requirement seat posts that are cut to fit. We believe that such an exclusion could result in a decrease in safety. Moreover, further work, such as testing and an examination of any existing standards that may be relevant, would be needed to consider the potential impact of such an exclusion. However, we will consider the issue when we conduct a more thorough evaluation of the bicycle standards.

(Comment 5) – One commenter remarked on the number of accidents that the commenter has witnessed resulting from bicycles seats raised too high. The commenter suggested requiring manufacturers to insert a marking that will indicate a safe seat height level.

(Response 5) – The current regulations require such marking. Consequently, no revision to the final rule is necessary regarding this comment.

G. Tests and Test Procedures (§ 1512.18)

The proposed rule would amend § 1512.18(k)(1)(i), which describes the procedure for conducting the fork test. The test procedure requires, in relevant part, that the load on the fork "be increased until a deflection of 64 mm (2 1⁄2 in) is reached." The test criteria, which are specified at § 1512.18(k)(1)(ii), explain that "[e]nergy of at least 39.5 J (350 in-lb) shall be absorbed with a deflection in the direction of the force of no more than 64 mm (2 1⁄2 in.)." Thus, the fork test involves applying a load to the fork, and the fork must absorb the required energy while not deflecting more than 64 millimeters, or 2.5 inches.

The proposed rule would delete the last sentence of § 1512.18(k)(1)(i) regarding a deflection of 64 millimeters (2.5 inches) because § 1512.18(k)(1)(i) may be interpreted (incorrectly) to conflict with § 1512.18(k)(1)(ii). In other words, a reader might construe the regulations to require force to be applied until the fork is deflected to 64 millimeters or 2.5 inches.

The proposed rule also would amend the reflector performance test description at § 1512.18(n)(2)(vii). The reflector performance test description discusses a coordinate system used for the reflector performance test and states: "[i]n the coordinate system and when illuminated by the source defined in table 4 of this part 1512, a reflector will be considered to be red if its color falls within the region bounded by the red spectrum locus and the lines y0.980 - - x and y0.335; a reflector will be considered to be amber if its color falls within the region bounded by the yellow spectrum locus and the lines y0.382, y0.790 - 0.667x, and y x - - 0.120." The y and x coordinates, as described in the rule, omitted important mathematical symbols or duplicated other mathematical symbols. The

proposal would revise § 1512.18(n)(2)(vii) to read: "[i]n the coordinate system and when illuminated by the source defined in table 4 of this part 1512, a reflector will be considered to be red if its color falls within the region bounded by the red spectrum locus and the lines y = 0.980 - x and y = 0.335; a reflector will be considered to be amber if its color falls within the region bounded by the yellow spectrum locus and the lines y = 0.382, y = 0.790 - 0.667x, and y = x - 0.120."

Section 1512.18(n)(2)(vii) also refers to the "IES Lighting Handbook, fifth edition, 1972," and a footnote to the rule explains that the IES Lighting Handbook may be obtained from the Illuminating Engineering Society (IES) and gives an address for IES. The reference to the IES Lighting Handbook is outdated, as is the address for the IES. More importantly, the recommended coordinate system for definition of color discussed in § 1512.18(n)(2)(vii), the "Internationale de l-Eclairage (CIE) 1931" system, is readily accessible for little or no cost from various sources in addition to the IES, including the Internet. Because the CIE 1931 color coordinate system is publicly available, the reference to the IES Lighting Handbook is not necessary. Therefore, the proposed rule would delete the reference to the IES Lighting Handbook and its accompanying footnote.

We received no comments on these provisions and have finalized them without change.

H. Additional Changes Requested by the Comments

1. Introduction

Several commenters suggested additional revisions to the bicycle regulations. We discuss those comments, and our responses, in this section.

2. Requirements for Braking Systems: Handbrakes and Grip Dimension (§ 1512.5(b)(3))

(Comment 6) – One commenter asked that we change the requirement for the brake lever grip dimension. Currently, the "grip dimension," which is defined as "the maximum outside dimension between the brake hand lever and the handlebars," shall not exceed 89 mm (3.5 inches). The commenter would change the maximum to 100 mm (4.0 inches) to accommodate new bicycle designs that include gear shift mechanisms on the lever. The commenter stated that, because of the need to accommodate the added shifting mechanism and allow space for the rider's hands, the brake lever portion of the combination brake/shift lever may be slightly farther away from the handlebar.

(Response 6) – We decline to revise § 1512.5(b)(3) because such an exclusion could result in a decrease in safety. In addition, further work, such as testing and an examination of any existing standards that may be relevant, would be needed to consider the potential impact of the commenter's suggested change. Thus, we will consider the commenter's suggestion when we undertake a more thorough evaluation of the bicycle standards.

3. Requirements for Braking Systems (§ 1512.5) and Tests and Test Procedures (§ 1512.18)

(Comment 7) – Two commenters would revise the requirements for braking system testing. One commenter stated that he had prepared a written explanation for why we should revise the braking standard, but the explanation was deleted. Another commenter would revise the braking system test requirements to require: (1) bicycles to be tested under wet conditions that might result in longer stopping time; (2) a "front

brake modulation test" that would determine if the front brakes of a bicycle have a propensity to grab abruptly, which could result in riders being thrown over the handlebars; and (3) a brake fade test to predict the loss of braking power when a rider is descending a hill and brakes overheat.

(Response7) - We agree, generally, that braking system testing requirements should be evaluated and revised. However, we decline to address this issue in the final rule. This rulemaking was intended, in part, to facilitate the testing and certification requirements of section 14 of the Consumer Product Safety Act (CPSA). Changing these standards would involve, among other things, an examination of any relevant existing standards and possibly the development of new testing regimes or an analysis of existing testing regimes. It would be more efficient and appropriate to consider such issues when we undertake a more thorough evaluation of the bicycle standards.

4. Requirements for Pedals (§ 1512.7)

(Comment 8) – Two commenters addressed clipless pedals, which are products that attach directly to the cleat of a cyclist's shoe. One commenter suggested we define the term "clipless pedal"; and both commenters suggested we exempt clipless pedals from the pedal reflector requirement. (Clipless pedals do not have the traditional platform or cage to support the foot and are not easily fitted with reflectors.)

(Response 8) – We acknowledge that reflectors cannot be installed on many clipless pedals. However, removing a pedal reflector from a bicycle may result in a decrease in safety. Changing the standard would involve, among other things, an examination of any relevant existing standards and possibly the development of new testing regimes or an analysis of existing testing regimes. It would be more efficient and

more appropriate to consider such issues when we undertake a more thorough evaluation of the bicycle standards.

(Comment 9) - One commenter sought an exemption for clipless pedals from the tread requirement, stating that "it is not feasible to place treads on the pedals, as there is very little space."

(Response 9) - We are aware of these concerns, but decline to address them in the final rule. Changing the standard would involve, among other things, an examination of any relevant existing standards and possibly the development of new testing regimes or an analysis of existing testing regimes. It would be more efficient and more appropriate to consider such issues when we undertake a more thorough evaluation of the bicycle standards.

5. Requirements for Protective Guards (§ 1512.9 (b))

(Comment 10) – One commenter would revise the requirement for derailleur guards at § 1512.9(b). The derailleur guard requirement is designed to prevent the drive chain from interfering with or stopping the rotation of the wheel through improper adjustments or damage. The commenter said that some bicycle models (specifically those that experienced cyclists are likely to use) lack room for a derailleur guard.

(Response 10) - We are aware of this concern, but decline to address it in the final rule. The derailleur guard is intended to protect the rider from an accident by preventing the drive chain and derailleur from interfering with the wheel because of improper adjustments or damage. Changing the standard would involve, among other things, an examination of any relevant existing standards and possibly the development of new testing regimes or an analysis of existing testing regimes. It would be more efficient and

more appropriate to consider such issues when we undertake a more thorough evaluation of the bicycle standards.

6. Component Failures Due to Material Fatigue (§1512.17(a))

(Comment 11) – One commenter asked us to evaluate component failures that are caused by material fatigue, which the commenter defined as the weakening and subsequent fracture of the material from repeated stress.

(Response 11) We agree that testing component parts that fail because of material fatigue is an important issue that should be evaluated and revised. However, we decline to address this in the final rule. Changing the standard would involve, among other things, an examination of any relevant existing standards and possibly the development of new testing regimes or an analysis of existing testing regimes. Thus, we will consider the matter when we undertake a more thorough evaluation of the bicycle standards.

I. Miscellaneous Comments

Several commenters addressed the proposed rule in general terms or addressed matters that were outside the scope of the proposed rule.

(Comment 12) - Three commenters agreed with the proposed rule in its existing form. One of the commenters, while pleased with the proposed rule at this point, urged us to review and assess the bicycle requirements in greater depth. In contrast, one commenter was opposed to the existence of any standard governing bicycle safety. In addition, the commenter expressed frustration that a more comprehensive review of the regulations could not take place before manufacturers are "forced into a testing regime."

(Response 12) - Section 14 of the CPSA requires manufacturers and private labelers of a product subject to a CPSC rule, ban, standard, or regulation to certify

compliance of the product with such rule, ban, standard, or regulation. As we stated in the preamble to the proposed rule (75 FR at 67043), we issued the proposed rule, in part, to facilitate the testing and certification required by section 14 of the CPSA. We also acknowledged that a more extensive review of the bicycle regulations is necessary (75 FR at 67044), but that we cannot accomplish such a review in the timeframe that is necessary for implementing the testing and certification requirements of section 14 of the CPSA. We will conduct a more extensive review of the bicycle regulations as time and resources permit.

(Comment 13) - One commenter noted that there is a typographical error in a CPSC Regulatory Summary of 16 CFR part 1512. In a description of the requirement for chains and chain guards, the document incorrectly substitutes "90%" for "90 degrees."

(Response 13) – CPSC Regulatory Summaries are found on our website and are not part of the rule. Nevertheless, we are examining our regulatory summaries and intend to revise or, in some cases, delete them to reflect current requirements and new information.

(Comment 14) – One commenter, while generally supportive of the rule, expressed concern that it might create an obligation for bicycle manufacturers to produce new parts.

(Response 14) – Nothing in the proposed rule or the final rule requires a bicycle manufacturer to produce new parts to the meet the requirements.

(Comment 15) - One commenter expressed concern over lead content in children's bicycles.

(Response 15) – If a bicycle is a "children's product," as defined by section 3(a)(2) of the CPSA, then it is subject to the lead content limit in section 101(a)(2) of the CPSIA. We note, however, that there is a stay of enforcement regarding lead content in certain parts of children's bicycles. In the Federal Register of June 30, 2009 (74 FR 31254), the Commission issued a stay of enforcement until June 1, 2011, regarding the lead content in certain parts of bicycles designed or intended primarily for children 12 years of age or younger. The Commission approved the stay to allow time to develop rules and requirements to address the very specific questions regarding lead content in children's bicycles. In the Federal Register of February 8, 2011 (76 FR 6765), the Commission extended the stay of enforcement until December 31, 2011.

III. Regulatory Flexibility Act

The Regulatory Flexibility Act (RFA), 5 U.S.C. chapter 6, requires the Commission to evaluate the economic impact of rules on small entities. The RFA defines small entities to include small businesses, small organizations, and small governmental jurisdictions. The small entities relevant to this rule are small businesses. It should be noted that we did not receive any comments related to the economic impact of the proposed rule.

We conclude that the final rule will not have a significant economic impact. The amendments make minor changes to the existing regulations to reflect new technologies, designs, and features of bicycles by clarifying that certain provisions or testing requirements do not apply to specific bicycles or bicycle parts. The amendments clarify

several ambiguous and confusing provisions. The final rule also corrects typographical errors and deletes an outdated reference.

These changes are not expected to result in product modifications in order to comply and do not require any additional testing or recordkeeping burdens. The clarifications and exceptions arising from the amendments could result in modest cost savings to small businesses via more focused testing or the elimination of unnecessary testing.

Accordingly, the Commission determines that the final rule will not have a significant economic effect on a substantial number of small entities.

IV. Paperwork Reduction Act

The purposes of the Paperwork Reduction Act of 1995 (PRA), 44 U.S.C. 3501 et seq., include reducing the paperwork burden on affected entities. The PRA requires certain actions before an agency can adopt or revise the collection of information, including publishing a summary of the collection of information and a brief description of the need for, and proposed use of, the information.

This final rule does not implicate the PRA because there are no collection of information obligations associated with the proposed amendments to part 1512.

V. Environmental Considerations

The final rule falls within the scope of the Commission's environmental review regulations at 16 CFR § 1021.5(c)(1), which provide a categorical exclusion from any requirement for the agency to prepare an environmental assessment or environmental

impact statement for amendments of rules or safety standards that provide design or performance requirements for products.

VI. Effective Date

The final rule will be effective on [INSERT DATE 30 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER.]

List of Subjects in 16 CFR Part 1512

Bicycles, Consumer Protection, Labeling.

For the reasons discussed in the preamble, the Consumer Product Safety Commission amends 16 CFR Part 1512 as follows:

PART 1512 –– REQUIREMENTS FOR BICYCLES

1. The authority citation for part 1512 continues to read as follows:

Authority: Secs. 2(f)(1)(D), (q)(1)(A), (s), 3(e)(1), 74 Stat. 372, 374, 375, as amended, 80 Stat. 1304–05, 83 Stat. 187–89 (15 U.S.C. 1261, 1262); Pub. L. 107–319, 116 Stat. 2776.

2. Amend § 1512.2 by revising paragraphs (b) and (d) and adding paragraph (g) to read as follows:

§ 1512.2 Definitions.

*****

(b) Sidewalk bicycle means a bicycle with a seat height of no more than 635 mm (25.0 in); the seat height is measured with the seat adjusted to its highest position. Recumbent bicycles are not included in this definition.

*****

(d) Track bicycle means a bicycle designed and intended for sale as a competitive velodrome machine having no brake levers or calipers, single crank-to-wheel ratio, and no free-wheeling feature between the rear wheel and the crank.

*****

(g) Recumbent bicycle means a bicycle in which the rider sits in a reclined position with the feet extended forward to the pedals.

3. Amend § 1512.4 by revising paragraphs (b) and (i) to read as follows:

§ 1512.4 Mechanical requirements.

*****

(b) Sharp edges. There shall be no unfinished sheared metal edges or other sharp parts on assembled bicycles that are, or may be, exposed to hands or legs; sheared metal edges that are not rolled shall be finished so as to remove any feathering of edges, or any burrs or spurs caused during the shearing process.

*****

(i) Control cable ends. Ends of all accessible control cables shall be provided with protective caps or otherwise treated to prevent unraveling. Protective caps shall be tested in accordance with the protective cap and end-mounted devices test, § 1512.18(c), and shall withstand a pull of 8.9 N (2.0 lbf).

*****

4. Amend § 1512.6 by revising paragraphs (a) and (c) to read as follows:

§ 1512.6 Requirements for steering system.

(a) Handlebar stem insertion mark. Quill-type handlebar stems shall contain a permanent ring or mark which clearly indicates the minimum insertion depth of the handlebar stem into the fork assembly. The insertion mark shall not affect the structural integrity of the stem and shall not be less than 2 1/2 times the stem diameter from the lowest point of the stem. The stem strength shall be maintained for at least a length of one shaft diameter below the mark.

*****

(c) Handlebar. Handlebars shall allow comfortable and safe control of the bicycle. Handlebar ends shall be symmetrically located with respect to the longitudinal axis of the bicycle and no more than 406 mm (16 in) above the seat surface when the seat is in its lowest position and the handlebar ends are in their highest position. This requirement does not apply to recumbent bicycles.

*****

5. Amend § 1512.12 by revising paragraph (b) to read as follows:

§ 1512.12 Requirements for wheel hubs.

*****

(b) Quick-release devices. Lever-operated, quick-release devices shall be adjustable to allow setting the lever position for tightness. Quick-release levers shall be clearly visible to the rider and shall indicate whether the levers are in a locked or unlocked position. Quick-release clamp action shall emboss the frame or fork when locked, except on fiber-reinforced plastics.

*****

6. Amend § 1512.15 by revising paragraphs (a) and (b) to read as follows:

§ 1512.15 Requirements for seat.

(a) Seat limitations. No part of the seat, seat supports, or accessories attached to the seat shall be more than 125 mm (5.0 in) above the top of the seat surface at the point where the seat surface is intersected by the seat post axis. This requirement does not apply to recumbent bicycles.

(b) Seat post. The seat post shall contain a permanent mark or ring that clearly indicates the minimum insertion depth (maximum seat-height adjustment); the mark shall not affect the structural integrity of the seat post. This mark shall be located no less than two seat-post diameters from the lowest point on the post shaft, and the post strength shall be maintained for at least a length of one shaft diameter below the mark. This requirement does not apply to bicycles with integrated seat masts, however, a permanent mark or other means to clearly indicate that the seat or seat post is safely installed shall be provided.

*****

7. Amend § 1512.18 by revising paragraphs (k)(1)(i) and (n)(2)(vii) as follows:

§ 1512.18 Tests and test procedures.

*****

(k) ***

(1) ***

(i) Procedure. With the fork stem supported in a 76 mm (3.0 in) vee block and secured by the method illustrated in figure 1 of this part 1512, a load shall be applied at the axle attachment in a direction perpendicular to the centerline of the stem and against

the direction of the rake. Load and deflection readings shall be recorded and plotted at the point of loading.

*****

(n) ***

(2) ***

(vii) A recommended coordinate system for definition of color is the "Internationale de l'Eclairage (CIE 1931)" system. In the coordinate system and when illuminated by the source defined in table 4 of this part 1512, a reflector will be considered to be red if its color falls within the region bounded by the red spectrum locus and the lines y = 0.980 - x and y = 0.335; a reflector will be considered to be amber if its color falls within the region bounded by the yellow spectrum locus and the lines y = 0.382, y = 0.790 - 0.667x, and y = x - 0.120.

*****

Dated: _____

_____

Todd A. Stevenson,

Secretary, Consumer Product Safety Commission