State of California—Health and Human Services Agency
Department of Health Care Services

JENNIFER KENT
Director

EDMOND G. BROWN JR
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Supersedes N.L. 07-1215
Supplements N.L. 03-0411
Index: Benefits

TO: ALL COUNTY CALIIFORNIA CHILDREN'S SERVICES (CCS) PROGRAM ADMNISTRATORS, MEDICAL CONSULTANTS AND INTEGRATED SYSTEMS OF CARE DIVISION (ISCD) STAFF

SUBJECT: COCHLEAR IMPLANT UPDATED CANDIDACY CRITERIA AND AUTHORIZATION PROCEDURE

I. PURPOSE

The purpose of this Numbered Letter (N.L.) is to update the policy regarding cochlear implant (CI) evaluation, surgery, and candidacy criteria.

II. BACKGROUND

This N.L. is to revise the current candidacy criteria for CI evaluation and surgery requests for the CCS Program. Oversight through outcomes monitoring and facility reviews will strive to ensure the continued quality of the CI program.

Evaluation requests submitted from the Communication Disorder Centers (CDC) that are also the CCS Program-approved Cochlear Implant Center (CIC), do not require physician or specialty review and will be considered a routine authorization.

CI evaluation requests from audiology providers that are not CICs, or any CI surgery requests, will be reviewed by the State Audiology or Medical Consultant, or its designee, according to the criteria set forth in this document.

The following institutions meet the specific CCS Program standards, and are considered to be among the top clinical and research facilities in the nation, with high implantation success rates and quality services. The current CCS Program-approved CICs include:

- 7.36.1: University of California Davis Medical Center (Internal referrals only)
- 7.36.2: Ronald Reagan University of California Los Angeles Medical Center
- 7.36.3: Children's Hospital, Oakland
- 7.36.4: Rady Children's Hospital, San Diego
- 7.36.07: Stanford Cochlear Implant Center (CIC), Palo Alto
- 7.36.08: University of California Irvine Medical Center
- 7.36.09: University of California San Francisco Medical Center
- 7.36.10: Lucille Salter Packard Children's Hospital, Palo Alto
- 7.36.12: USC Center for Childhood Communication
- 7.36.13: House Children's Hearing Center of UCLA

Centers of excellence wishing to apply for the CCS Program status will be evaluated on a case-by-case basis. Submit applications to the California Department of Health Care Services (DHCS) ISCD facility review inbox at CCSFacilityReview@dhcs.ca.gov. It may be prudent to send an alert that an application has been sent to the DHCS ISCD audiology inbox at AudConsult@dhcs.ca.gov.

The primary goal of cochlear implantation through the CCS Program is the development or enhancement of auditory-oral communication. The CCS Program does not authorize implantation solely for the purpose of sound awareness.

The following policy will allow children to receive the appropriate standard of care, as mandated in Title 22, Section 51340 of the California Code of Regulations.

III. POLICY

A. Local independent county CCS program offices and DHCS, or its designee, shall issue Service Authorization Requests (SARs) for the CI evaluation to the CCS Program-approved CIC when the child has been referred by the CDC at the same facility or the CIC itself. The SAR will indicate if the request is being made by the CIC.

The SAR will include the Service Code Grouping (SCG) 05 to the CIC number and the SCG 01 to the CCS Program-paneled surgeon selected by the CIC, and will be issued for 180 days or through the current program eligibility period.

B. Requests for CI evaluations submitted by the non CCS Program-approved providers, or by the CCS Program-approved CDCs that are not also CICs, will continue to require review by the State Audiology or Medical Consultant, or its designee. If the referring audiologist, school, or physician does not indicate a specific CIC in the referral, the parents should be informed of the CIC(s) geographically near their home to assist them in deciding where to go. If the parents do not indicate a preference, the State Audiology or Medical Consultant, or its designee, will choose the facility to best serve the family.

C. CI evaluation requests can be submitted as soon as the hearing loss is identified; there is no minimum age for referral. A trial with hearing aids can be conducted concurrently with the CI evaluation to assess whether there is a benefit from traditional amplification.

D. Each CIC will conform to the CCS Program CI Specialty Care Center Standards (http://www.dhcs.ca.gov/services/ccs/Documents/CICStandards.pdf) and send in outcome data on all its CCS Program CI recipients at 1 year, 3 year and 5 year intervals via the CI Reporting Form (Attachment A). An on-line version of the form is expected.

E. CI Evaluations

1. In order for children to be considered candidates **for CI Evaluations, please submit the documentation meeting the following criteria:**

   a. For children at initial diagnosis:

      (1) Audiogram (must be performed when the child has developed the head turn behavior) or Auditory Brainstem Responses (ABR) for young infants who have not developed the head turn behavior indicating presence of a bilateral, moderate sloping to severe-profound sensorineural hearing loss (SNHL) or Auditory Neuropathy Spectrum Disorder (ANSD).

      (2) CI surgery evaluations for infants and toddlers should not be withheld to await developmental maturity for reliable audiometry if clinical assessment leans strongly toward need for CI.

      (3) For ABR results, ear-specified, performed with tone-burst stimuli, from 500-4000 Hz, converted from ABR thresholds (nHL) to estimated hearing level (eHL).

      (4) For audiogram results, ear-specified, 500 Hz through 8K Hz.

      (5) Both AC (air conduction) & BC (bone conduction) information must be included.

   AND

2. Documentation that maximum amplification through traditional hearing aids do not provide (or are expected not to provide) sufficient access to the speech spectrum or offer sufficient speech discrimination to benefit for speech-language development. If it is expected that hearing aids will not support

speech-language development, please explain.

a. For children with previously diagnosed hearing loss with:

(1) The presence of a bilateral profound sensorineural hearing loss,

OR

(2) Unilateral profound SNHL with moderate sloping to severe-profound sensorineural hearing loss or (ANSD) in the contralateral ear.

AND

(3) Reliable history of no benefit from traditional hearing aid (HA) at maximum amplification with child specific technology.

3. Additional considerations for CI Evaluation approval:

a. Hearing loss after meningitis. Due to the possibility of cochlear ossification following meningitis, these requests should receive expedited review.

b. Candidacy consideration should be extended for children with a diagnosis of sudden blindness or a condition that is expected to result in blindness in the immediate future, due to the resulting limitations of language access and communication through visual means, such as sign language.

c. Infants with ABR/audiogram results indicating profound SNHL and/or ANSD with indication that CI will be necessary, should be referred for CI evaluation to minimize auditory deprivation as much as possible, should CI ultimately be indicated.

F. First Unilateral and Bilateral Simultaneous CI Surgery Requests.

1. Requests for CI surgeries must be adjudicated by DHCS, or its designee. Requests for CI surgeries must be submitted by the County to DHCS at a minimum of sixty (60) days prior to surgery date.

2. Retro-authorization of CI surgeries for unilateral or simultaneous will NOT be given.

3. Children will be considered candidates for CI **surgery**, unilateral or simultaneous bilateral, with the following criteria:

a. The CI surgery is requested by the CCS Program-approved CIC team (surgeons, audiologists, speech pathologists, educational specialists, and

psychologists as indicated).

b. There are no contraindications to surgery.

c. Laterality and type of surgery (unilateral or bilateral simultaneous) is specified.

d. Documentation of an up to date vaccination status or appropriate catch up schedule for Influenza, Haemophilus Influenza, and Pneumococcal vaccines, if there are no contraindications.

(1) CI surgery will not be covered by the CCS Program if parents waive the above vaccinations for non-medical reasons.

e. Post meningitis with evidence of or concern for cochlear ossification and a normal acoustic nerve free of lesions that is not hypoplastic, surgery will be authorized as soon as possible and without regard to chronologic age or hearing aid usage. Age-appropriate communicative intent and measurable language base must still be considered. Please submit physician confirmation of the meningitis.

f. Documentation that the CIC has evaluated the evidence-based prognostic factors by disclosing concerns in the categories below. Highly or moderately concerning factors are expected to be addressed in a narrative such that it that it supports the child is an appropriate candidate for CI Surgery.

(1) Prognostic Factors Categories (Refer to Attachment B):

(a) Medical Indications and Considerations.

(b) Audiology and Functional Hearing – see details below.

(c) Speech Language – see details below.

(d) Behavioral/Psychosocial and Family Structure.

(e) Family Support.

(f) Educational Environment and Support.

(2) For Audiometric Issues: Show maximum traditional aiding is inadequate

(a) Audiometric evaluation must be conducted by a CCS Program-

paneled and CIC associated Audiologist.

(b) The unaided audiogram (500 Hz through 8 KHz) demonstrates bilateral moderate sloping to severe-profound sensorineural hearing loss and/or ANSD.

(c) If ANSD, behavioral and cortical stimulation/electrophysiologic test results are necessary to confirm the degree of hearing loss and show that the disorder disrupts the evoked potential of the nerve.

(d) Children with progressive hearing loss may be considered for CI if there is a steep and rapid trajectory toward insufficient benefit from amplification.

(e) Provide measurements of baseline aided speech awareness thresholds (SAT) with presentation level.

(f) Provide measurements of baseline aided speech perception scores, if speech perception testing can be performed. Speech perception testing shall be performed according to the child's speech-language skills such as:

i. Early Speech Perception (ESP), Phonetically Balanced Kindergarten (PB-K) words, Multisyllabic Lexical Neighborhood Test (MLNT), etc.

ii. For young children who have not developed verbal skills, auditory questionnaire such as Infant-Toddler Meaningful Auditory Integration Scale (IT-MAIS) or LittlEARs to validate the child's pre-verbal and early verbal auditory skills.

(3) For Speech Language Issues:

(a) Speech language evaluations must be conducted by a CCS Program-paneled and CIC associated SLP or equivalent and CIC associated.

(b) Provide documentation of baseline speech and language development.

i. Assessment of age appropriate communicative intent.

ii. Receptive and expressive language skills assessment with age equivalents.

G. Second Sequential CI Implantation

1. Sequential implantation will not be authorized if bilateral simultaneous implantation was indicated at the first surgery unless medical necessity for the delay can be demonstrated.

2. CIC shall submit information on why a sequential implant would be beneficial for the specific child in question.

3. For a sequential, bilateral implantation, the same audiometric criteria must be met as for the first implant. CI surgery for second sequential implantation will be assessed with the following additional criteria:

    a. Documented progress in auditory-oral communication.

    b. Evidence of compliance with use of the first device.

    c. Consistent hearing aid use or at least sound awareness in the non-implanted ear if amplification is not used due to a lack of benefit.

    d. Audiometric evidence of at least aided sound awareness (SAT), evidence of functioning nerve, or evidence of progressive hearing loss, documented in the non-implanted ear.

    e. Unilateral and bilateral aided audiograms showing inadequate access to the speech spectrum/poor speech discrimination persisting with current CI in use.

H. Explanation/Implantation

1. Explant /implant surgeries will be assessed with the following criteria.

2. Specification of reasons /medical necessity.

3. Prior operative note if obtainable.

4. Warranty status.

5. Documentation of device use and compliance with post-CI services and therapy.

6. Device failure report when indicated.

7. Speech and language progress since initial activation.

IV. IMPLENTATION

A. Authorizations for CI evaluations and surgeries should follow the instructions found in N.L. 03-0411. Counties and DHCS, or its designee, offices should review the Cochlear Implant Approval Checklists (Attachment C) to ensure all elements required for review are included in the fax. If elements are missing, the local county or DHCS, or its designee, staff should contact the provider to obtain the information prior to submission to the State Audiology or Medical Consultant, or its designee for either a CI evaluation or surgery review.

B. Requests for **CI evaluations** from providers that are not a CCS Program-approved CIC, should be forwarded by fax to (916) 440-5297, and include the name, date of birth and CCS Program number of the beneficiary and the nurse case manager contact information. The fax should include the documentation detailed in Section E of this document.

C. Requests for **CI surgeries** should be forwarded by fax to (916) 440-5297, and should include the name, date of birth and the CCS Program number of the beneficiary, the contact information for the nurse case manager, and an indication that the request is a CI surgery. The fax should include the supportive documentation submitted by the CIC Team that addresses the issues detailed in Section F and Attachment C of this document.

D. Additional reports, evaluations, and Individualized Education Plans (IEP)/Individualized Family Service Plans (IFSP) are not initially necessary, but should be available upon request by the State Audiology or Medical Consultant, or its designee.

E. It is not necessary to include the Early and Periodic Screening, Diagnosis, and Treatment (EPSDT) Program worksheet, or pend SARs for approval prior to forwarding the case to the State Audiology or Medical Consultant, or its designee, if it is not clear which provider will be offering the services.

F. As instructed in N.L. 03-0411, "Approved Y" SARs from the State Audiology Consultant requires authorization by the local county CCS program and notification to the provider and family. "Approved-N" SARs indicate the recommendation by the State Audiology or Medical Consultant, or its designee for the denial of services, and the case notes, contained within the CCS Program's CMSNET database, will indicate the reason for denial according to the criteria in this N.L. Language from the case note can be used in the Notice of Action, which must be issued by the local county CCS program in accordance with N.L. 03-0205.

Should you have any questions regarding the authorization of the CI services, please contact the State Audiology or Medical Consultant, or its designee by e-mail at AudConsult@dhcs.ca.gov or by fax at (916) 440-5297.

Sincerely,

ORIGINAL SIGNED BY

Sarah Eberhardt-Rios, Division Chief
Integrated Systems of Care Division

Attachments

Annual Cochlear Implant Center Report

Facility Information

Cochlear Implant Center (CIC) Name:

CCS CIC Number: Date:

CIC Address: City: Zip Code:

Director Email Address:

Chief Audiologist: Email Address:

Surgeon: Surgeon NPI Number

Contact Person: Email Address:

Contact Phone: Contact Fax:

In the Last 12 Months:

Number of CCS CI Evaluations

Number of Non-CCS CI Evaluations

Number of CCS CI Evaluations Approved for Surgery Request

Number of Non-CCS CI Evaluations Approved for Surgery Request

Number of CCS Surgery Requests Approved

Surgery Type (Include # for each below):

- Unilateral
- Bilateral Sequential Bilateral Simultaneous
- Second Implant on Existing User
- Explant/Implant

Number of Non-CCS Surgery Requests Approved

Surgery Type (Include # for each below):

- Unilateral
- Bilateral Sequential Bilateral Simultaneous
- Second Implant on Existing User
- Explant/Implant

Annual Cochlear Implant Patient Reporting Form

Facility Information

Cochlear Implant Center (CIC) Name:

CCS CI Center Number: Date:

Surgeon: Surgeon NPI:

Child Specific Information

Child's Name: CCS Number: DOB:

Age at Diagnosis: Age at Hearing Aid Fitting:

First CI Surgery: Age Date Second CI Surgery: Age Date

Child's Primary Language: Primary Language Spoken at Home:

Primary Instructional Language: English Other

If the Child uses Sign at school, does the family exceed the child's sign skills? Yes No

CI Outcome Info: Pre CI **1Year Post CI** **3 Years Post CI** **5 years Post CI**

Major Surgical Complications: Yes No

If Yes, Check Reason: Failed Internal Device Soft Failure Problems w/ Device

Location/ Anatomy and Positioning/Reaction Other (Specify)

Detecting Sound across the Speech Spectrum (15dB to 30 dB): Yes No

Speech Pattern Perception (select one): Select One

Speech Discrimination (select one): Select One

Speech Identification (select one): Select One

Word Discrimination: Score Test

Sentence Discrimination: Score Test

Word Score Phoneme Score

Speech Language Parameters: Score (SC), Chronological Age (CA), Age Equivalent (AE), Test Type (TT), Test Condition (TC)

Receptive Language: SC CA AE TT TC

Expressive Language: SC CA AE TT TC

Receptive Vocabulary: SC CA AE TT TC

Expressive Vocabulary: SC CA AE TT TC

Articulation: SC CA AE TT TC

Educational Placement (check one): American Sign Language (ASL) ☐

Total Communication ☐ Oral ☐ Mainstream ☐ Mainstream w/Interpreter ☐

Partial Mainstream ☐

Therapy Regimen (check all that apply): School Speech Language Pathologist ☐

School Auditory Verbal Therapist ☐ Private Speech Language Pathologist ☐

Private Auditory Verbal Therapist ☐ Teletherapy (EBRT) ☐

Additional comments:

Please include pre surgery audiogram both aided and unaided and 1 year post CI audiogram

To include:

Speech recognition thresholds (SRT), Most comfortable Level (MCL), Uncomfortable Loudness Level (UCL)

EVIDENCE BASED PROGNOSTIC FACTORS
ISSUES TO ADDRESS

Part 1: ISSUES TO ADDRESS WHEN REQUESTING CI SURGERY AUTHORIZATIONS

I. Medical

A. Age.

B. Developmental delay or concern for developmental delay. What is patient's ability to learn, follow directions, and develop communication?

C. Comorbid conditions that might interfere with treatment success.

D. Anatomic concerns.

E. Status of the cochlea, internal auditory canal, and cochlear nerve(s):

1. Size and integrity of IAC, cochlear anomalies, and integrity of the cochlear nerves.

2. Presence of residual hearing or benefit from amplification (aided speech awareness threshold) if hypoplastic nerve.

F. Radiographic findings documented by a computerized tomography (CT) and/or magnetic resonance imaging (MRI).

1. When there are structural abnormalities and/or insufficient evidence of a functioning auditory nerve, risk of intracranial/parenchymal injury (NICU stays etc.), and significant developmental delay, MRI in addition to CT is needed.

2. The otolaryngologist may read the images and provide a formal reading in their note. Repeating what the radiologist reports is not sufficient. Either the radiologist or the ears nose throat physician (ENT) should actually read the films and this reading should be submitted. When there are abnormalities on imaging, submit the radiology reading as well as the ENT.

G. Otolaryngologist assessment of suitability for implantation.

II. Audiology and Functional Hearing

A. Length of auditory deprivation

1. Hearing age and timing of actual access to sound and speech.

2. The time of loss of nerve stimulation estimated by time of HA insufficiency or lack of nerve stimulation (including for second sequential prior to new surgery request for contralateral ear).

B. Compliance with hearing aid usage.

C. Limited or no benefit from hearing aids demonstrated by speech perception scores, such as:

1. Early Speech Perception (ESP), Phonetically Balanced Kindergarten (PB-K) words, Multisyllabic Lexical Neighborhood Test (MLNT), etc. according to the child's speech-language skills.

2. For young children who have not developed verbal skills, auditory questionnaire such as Infant-Toddler Meaningful Auditory Integration Scale (IT-MAIS) or Little EARs to validate the child's pre-verbal and early verbal auditory skills.

III. Speech/Language

A. Starting language base.

B. Prognosis for oral speech development.

C. Age and estimate of auditory brain plasticity.

1. For children approaching or over four (4) years of age, communication between caregivers and child in either oral or sign language, that demonstrates complex communication with the expression of ideas, opinions and needs.

IV. Behavioral/Psycho-Social/Family Structure

A. Socioeconomic factors, such as family stability, home environment or family stressors that might interfere with treatment success.

B. Vehicle, worktime, or travel distance concerns that might interfere with treatment success.

C. Behavioral issues/child centered stressors that might interfere with treatment success at home, therapy, or educational settings.

V. Family Support

A. Motivation and engagement by the parents and/or caregivers and family. Willingness to enroll and participate in the most appropriate education program. Willingness to learn family based therapy and have the home be part of long-term rehabilitation.

B. Appointment and treatment regimen compliance. Commitment to participate in intensive therapy.

C. Appropriate understanding and expectations of the prognosis of CI by the parent(s) or caregiver(s).

VI. Educational Environment and Support

Availability and accessibility of appropriate habilitation and rehabilitation services that support the development of auditory-oral communication with a CI, including the specific plan for post-CI services.

A. Classroom placement (mainstream or other)

VII. Emerging or newly established metrics, indications, and candidacy outcome factors elucidated by this field of fast moving technical advances and research.

Part 2: Child Cochlear Implant Profile (CHIP) Rating

http://www.dhcs.ca.gov/services/ccs/Documents/Attach3Form.pdf

California Children's Services
Child Cochlear Implant Profile (CHIP) Rating

I. Medical

(0) No concerns:

- Normal imaging. No medical conditions that can increase surgical or anesthetic risks.

(1) Mild concerns:

- Imaging: EVA (enlarged vestibular aqueduct - increased risk of Gusher); Mondini (with good cochlear length). No medical conditions that can increase surgical or anesthetic risks.

(2) Mild concerns:

- Imaging: Mondini (with shorter cochlea) or minor MRI changes (non-specific). No medical conditions that can increase surgical or anesthetic risks.

(3) Moderate concerns:

- Imaging: IP (incomplete partition) type I with small opening towards the IAC (internal auditory canal) and good cochlear length; MRI changes: leukodystrophy, etc. Medical conditions that can increase surgical or anesthetic risks (mild).

(4) Great concerns:

- Imaging: IP type I with small cochlear length and large opening towards IAC; hypoplastic cochlea; hypoplastic cochlear nerve. Medical conditions (including diabetes, seizures, bleeding disorders, etc.) that mild/moderately increase the surgical or anesthetic risks; healing disorders (connective tissue disorders).

(5) Great concerns:

- Imaging: Absent cochlear nerve; common cavity. Medical conditions that pose high surgical or anesthetic risks.

II. Audiology Hearing/Hearing Aid Use

(0) No concerns:

- A patient who has hearing loss and is within the audiologic criteria

- A patient who consistently wears the hearing aids

(1-3) Mild to moderate concerns:

- An audiologically borderline candidate
- A patient who inconsistently wears the hearing aids

(4-5) Severe concerns:

- A patient who has normal hearing
- A patient who does not wear the hearing aids and makes no effort to do so

Chronological Age

(0) No concerns:

- A patient who is under two years of age and has potential of developing speech and language.
- A patient who is over two years of age wears hearing aids consistently and has age appropriate speech and language development.

(1-3) Mild to moderate concerns:

- A patient who is two-four years of age and has not yet shown potential for developing speech and language.
- A patient who is over two years of age, who does not wear hearing aids consistently and may or may not have developed age appropriate speech and language development.

(4-5) Severe concerns:

- A patient who is 4-5+ years or older with little to no speech and language development.

Functional Hearing (Speech Perception)

(0) No concerns:

- A patient who receives less than 60% on speech perception testing.

(1-3) Mild to Moderate concerns:

- A patient who is performing between 60%-70% on speech perception testing.

(4-5) Severe concerns:

- A patient who is performing at 70% and above on speech perception testing.

III. Speech/Language

(0) No concerns:

- Typical or near typical language development with a history of good functional listening abilities (progressive loss, post lingual, etc.).

(1-3) Mild to Moderate concerns:

- Pre-lingual child 0-18 months with good history of hearing aid use, some functional listening abilities and speech and language emerging **(1= mild concerns due to young age not being predictive of speech and language abilities at a later age).**
- Pre-lingual child 0-18 months with no or little history of hearing aid use, limited functional listening abilities and limited speech and language development **(2= moderate concerns).**
- Pre-lingual child 19 months to 2 ½ years with no or little history of hearing aid use, limited functional listening abilities and moderate to severe speech and verbal language disorder **(3= moderate concerns).**

(4-5) Severe concerns:

- Child approaching 3 years and older with or without a history of hearing aid use, limited functional listening abilities and no or little oral language development.
- Other known disabilities in addition to hearing loss and severe speech and language disorder which may impact listening and spoken language outcomes (autism, severe oral motor deficits and/or apraxia, cerebral palsy, processing deficits, etc.). ** These may be accounted for in the developmental evaluation; increased severity should be accounted for in only one developmental area.
- Child who prefers to use a visual communication system and/or is not invested in listening and spoken language for communication.

IV. Developmental/Psycho-Social Attention and Behavior

(0) No concerns:

- Appropriate attention and behavior, taking age into consideration. No concerns reported in social, emotional, or behavioral functioning at home, school, or community. Behavioral rating questionnaires indicated minimal to no concerns in this area. Attention and behavior do not impact day to day functioning. No additional supports are needed.

(1-3) Mild to Moderate concerns:

- Mild issues with behavior or attention. Behavioral questionnaires, interview, or observations indicate borderline or at risk concerns for certain areas of social, emotional, or behavioral functioning. Examples would be mild levels of anxiety, social reticence, mild inattention, mild compliance issues, where a moderate level of support is needed. Toward the moderate range, these factors impact day to day functioning.

(4-5) Great concerns:

- Clear behavioral or emotional diagnoses such as ADHD, or Anxiety Disorder, that greatly impact functioning day to day. Child has difficulty regulating his or her emotional or behavioral functioning across settings. Examples include high levels of impulsivity, inattention, aggression, noncompliance, or anxiety. A high level of support is needed.

Family Structure and Support

(0) No concerns:

- Parents' relationship is intact and high functioning; parents may have higher education levels; no mental health or other health issues for family members; no history of legal problems; no other children with disabilities; no other stressors; parent(s) have regular employment and stability in their home; family has social support network nearby, such as friends, extended family members, etc.; family has reliable transportation and the time/availability to provide follow up care.

(1-3) Mild to Moderate concerns:

- Family lives far from this center (one hour drive or more one way); housing or job situation for parent may not be stable; limited but present social support network; mild mental health or other issues for parents; have another child with disability; single parent; younger parent with limited educational level.

(4-5) Great concerns:

- Significant mental health concerns for parent; significant health issues for parent or other child; history of domestic violence, marital stress and/or instability; history of substance abuse for the parent; very limited to no social support network; parent is unstable with job, housing, etc. A significant amount of barriers exist overall.

Family Expectations:

(0) No concerns:

- A patient and/or family who have realistic expectations regarding implantation and are aware that the cochlear implant may or may not provide benefit.

(1-3) Mild –moderate concerns:

- A patient and/or family that express borderline realistic expectations regarding implantation.

(4-5) Severe concerns:

- A patient and/or family that do not have realistic expectations regarding implantation.

Additional Handicaps:

(0) No concerns:

- Non-verbal cognitive skills (and motor skills for an infant or young child) fall in the average or above-average range; no reported additional conditions such as developmental disability or autistic disorder.

(1-3) Mild to moderate concerns:

- Mild concerns or delays in the area of non-verbal cognitive skills or motor skills (if an infant or young child). Skills may fall in the below-average to borderline range. Some cases of mild developmental delay may fall in the moderate range here.

(4-5) Great concerns:

- Significant delays in non-verbal or motor skills; diagnoses of developmental delay in the moderate, severe, or profound range; diagnoses of moderate to severe autism.

V. Educational

Educational Environment

(0) No concerns:

- Appropriate educational placement and environment for the child. No concerns reported in home or classroom environment. No additional supports are needed.

(1-3) Mild to Moderate concerns:

- Classroom environment may or may not be appropriate for a child with hearing loss. (i.e. Total Communication, Oral/Auditory or ASL.)

(4-5) Great concerns:

- Living outside of the area where there are no support services or resources for families of children with hearing loss.
- Child not receiving services and/or attending school at an age where early intervention services are needed.

Educational Support Services

(0) No concerns:

- All early intervention support services are being met. No additional supports are needed.

(1-3) Mild to Moderate concerns:

- If punctuality or absences are a problem. Lack of support from family or school.

(4-5) Great concerns:

- Living outside of the area where there are no support services or resources for families of children with hearing loss.
- Child not receiving any services at an age where early intervention services are needed.

California Children's Services
Child Cochlear Implant Profile (CHIP) Rating

Patient Name			CCS# Meeting	Date of CI Team
Factors	**No Concern (0)**	**Mild-Mod Concerns (1-3)**	**Great Concerns (4-5)**	**Justifications/Concerns**
Medical Medical/Radiological				
Audiology Hearing/ Hearing Aid Use				
Audiology Chronological Age				
Audiology Functional Hearing (Speech Perception)				
Speech/Language Speech/ Language Abilities				
Developmental/ Psych-Social Attention/Behavior				
Developmental/ Psych-Social Family Structure & Support				**Attendance/Motivation**:
Developmental/ Psych- Social Family Expectations				
Developmental/ Psych- Social Additional Handicaps				
Educational Educ. Environment				
Educational Educ. Support Services				
TOTAL SCORES				**Combined Score: (Pre-Implant Rating) (A=** 0-6), (**B=** 7-11), (**C**=12-16), (**D**=16+)
ADDITIONAL CONCERNS/INFORMATION: Total = □ Appropriate CI Candidate: Ear: □ Right □ Left □ Bilateral □ Device □ Not an appropriate CI Candidate at this Center at this time. □ Deferral □ 3 months □ 6 months				

Completed by: _____ Phone: _____

CI EVALUATION AND SURGERY CHECKLISTS

I. CI Evaluation Documentation Checklist

A. Audiometric criteria or if infant – ABR, IT-MAIS

1. If ABR (for young infants who have not developed the head turn behavior) is performed – 500 to 4000 Hz, performed with tone-burst stimuli, converted ABR thresholds (dBnHL) to estimated hearing level (dBeHL).

2. Audiogram (must be performed when the child has developed the head turn behavior): Moderate sloping to severe-profound SNHL from 500 Hz to 8KHz or ANSD.

3. Ear-specified, including both AC/BC information.

B. Insufficiency (or expectation of) with maximum amplification.

C. Documentation of special considerations.

D. Meningitis- include physician report confirming diagnosis.

E. Blindness.

F. Infants with ABR with profound (or no response) or other indication that CI will be necessary.

II. CI Surgery Documentation Checklist

A. Audiometric criteria such as:

1. Auditory Brainstem Response “ABR”: performed with tone-burst stimuli from 500 Hz to 4000 Hz, converted ABR thresholds (nHL) to estimated hearing level (eHL).

2. Audiogram (must be performed when the child has developed the head turn behavior): Bilateral moderate sloping to severe-profound SNHL from 500 Hz to 8K Hz or ANSD.

3. Ear-specified; including both AC & BC information.

4. Progressive hearing loss with trajectory toward insufficient benefit from hearing aid amplification.

5. If ANSD, cortical stimulation/electrophysiologic testing results.
6. Other child specific indications that hearing aids will not be adequate.

B. Speech Language Evaluation Results.

1. Communicative Intent

2. Receptive and Expressive language scores with age equivalents.

3. Speech discrimination scores with presentation level.

C. Vaccination (or documentation of contraindications)

1. HIB.

2. Influenza.

3. Pneumovaccine.

D. Meningitis- include physician report confirming diagnosis.

E. List/ discussion of positive and negative prognostic factors and case-specific concerns.

III. Second Sequential Documentation Checklist

A. Consistent CI use.

B. Attends and engaged in therapy.

C. Non-implanted ear HA use.

D. Non-implanted ear aided sound awareness thresholds/speech discrimination score with presentation level.

IV. Explant/Implant

A. Reasons for explant/implant.

B. Prior Operative Note.

C. Warranty status.

D. Compliance with device use and post-CI services and therapy.

E. Device Failure Report if indicated.

F. Progress in speech and language development since activation.