

AUSTRALASIAN ORTHODONTIC BOARD



CASE IDENTIFICATION 18 - ST



AUSTRALASIAN ORTHODONTIC BOARD

CASE DETAILS (Form 2)

After you have received your AOB Number, you must submit to your **State Convenor**¹:

- **Form 2 - Case Details** (one copy for each of your two Board Cases)
- **Pre-treatment records**² for each of the **two Board Cases**
- **Radiographs** (OPG and Lat Ceph) for each of the **Back-up Cases**

The radiographs for your back-up cases will be noted and returned to you immediately. When AOB-appointed peers have assessed your two Board Cases, the case records and an evaluation report will be returned to you. **Assessment will be anonymous and non-graded.** You will be notified when you have received AOB First Stage.

Case ID	18 - ST	Date Submitted	01-07-2005	
Gender	Female	Date of Birth	04-01-1991	
Medical History	Nil relevant			
Dental History	Congenitally missing upper right lateral incisor			
Oral Health Status	Satisfactory			
Angle Classification	<input type="checkbox"/> Class I <input checked="" type="checkbox"/> Class II Div 1 <input type="checkbox"/> Class II Div 2 <input type="checkbox"/> Class III			
Molar Relationship	Right	Half tooth Class II	Left	Whole tooth Class
Anterior Relationship	Overjet	4 mm	Overbite	4 mm
Centrelines	Upper	4 mm to right	Lower	1 mm to left
Arch length discrepancy	Upper	0 mm	Lower	0 mm
Summary of Radiographs	OPG All teeth present apart from the Congenitally missing lateral incisor (12)			
	Lat Ceph See attached cephalometric analysis (Summary of Findings)			

Treatment Plan

Extractions	Nil
Appliance(s)	Fixed appliances - Roth prescription (018" slot)
Treatment mechanics	Align, level and coordinate the arches. Create space for prosthetic replacement of missing lateral incisor. Use headgear and/or inter-maxillary elastics to establish Class I occlusion
Proposed retention	Upper and lower removable retainers (prosthetic tooth in position of missing lateral incisor)

Additional Comments

Please proceed to Page 2 for additional comments.

¹ Contact details of State Convenors are listed on the AOB website at www.aso.org.au/aob.

² Stipulated requirements for records are listed on the AOB website at www.aso.org.au/aob.



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Additional Comments

Please evaluate this case. This submission should include comments such as relevant features of the case, the reasons why this treatment has been proposed and any possible alternate treatment plans. It should also include such items as the challenges and difficulties that may be encountered during treatment.

Case ID: 18 - ST

This patient has a fairly severe, asymmetric, Class II Division 1 malocclusion.

In the upper arch the upper right lateral incisor is congenitally missing. The upper central incisors are separated by a midline diastema (which is associated with a low frenal attachment) and the upper left lateral incisor is rotated. The upper right canine has drifted forward into the position of the missing lateral incisor.

There is space to spare in the lower arch which is reasonably well aligned.

The lower incisors are forward of their ideal position but the patient has a pleasant profile and a brachyfacial skeletal pattern, and I consider that it would be preferable to leave them in this position. Therefore, I will treat this as a non-extraction case.

The patient's maxilla is slightly forward of ideal so, to harmonize her profile, I will endeavour to obtain most of the antero-posterior correction using headgear. Because of the asymmetry, intermaxillary elastics will also be required to obtain a Class I occlusion on the left side.

I will use a bonded wire to prevent the upper midline diastema from re-opening and an upper removable retainer with a prosthetic tooth replacing the missing lateral incisor. I will consider an upper midline frenectomy if the frenum is bulky and unattractive.

The main challenge in this case will be to motivate the patient to wear headgear and intermaxillary elastics to correct the asymmetric antero-posterior disharmony.

An alternative treatment would be to remove the upper left lateral incisor and to reshape both upper canines to resemble and replace the missing lateral incisors and to leave the buccal relationship a full tooth Class II.

Another alternative would be to align, level and co-ordinate both arches with fixed appliances (leaving a space for the missing lateral incisor) and to surgically correct the antero-posterior disharmony by asymmetric mandibular advancement.

The patient and I prefer the chosen treatment plan as outlined above.

Case ID 18 - ST
DOB 04 01 1991
Age 11.10 years
Sex Female

Status Pre-treatment
Date 02 12 2002

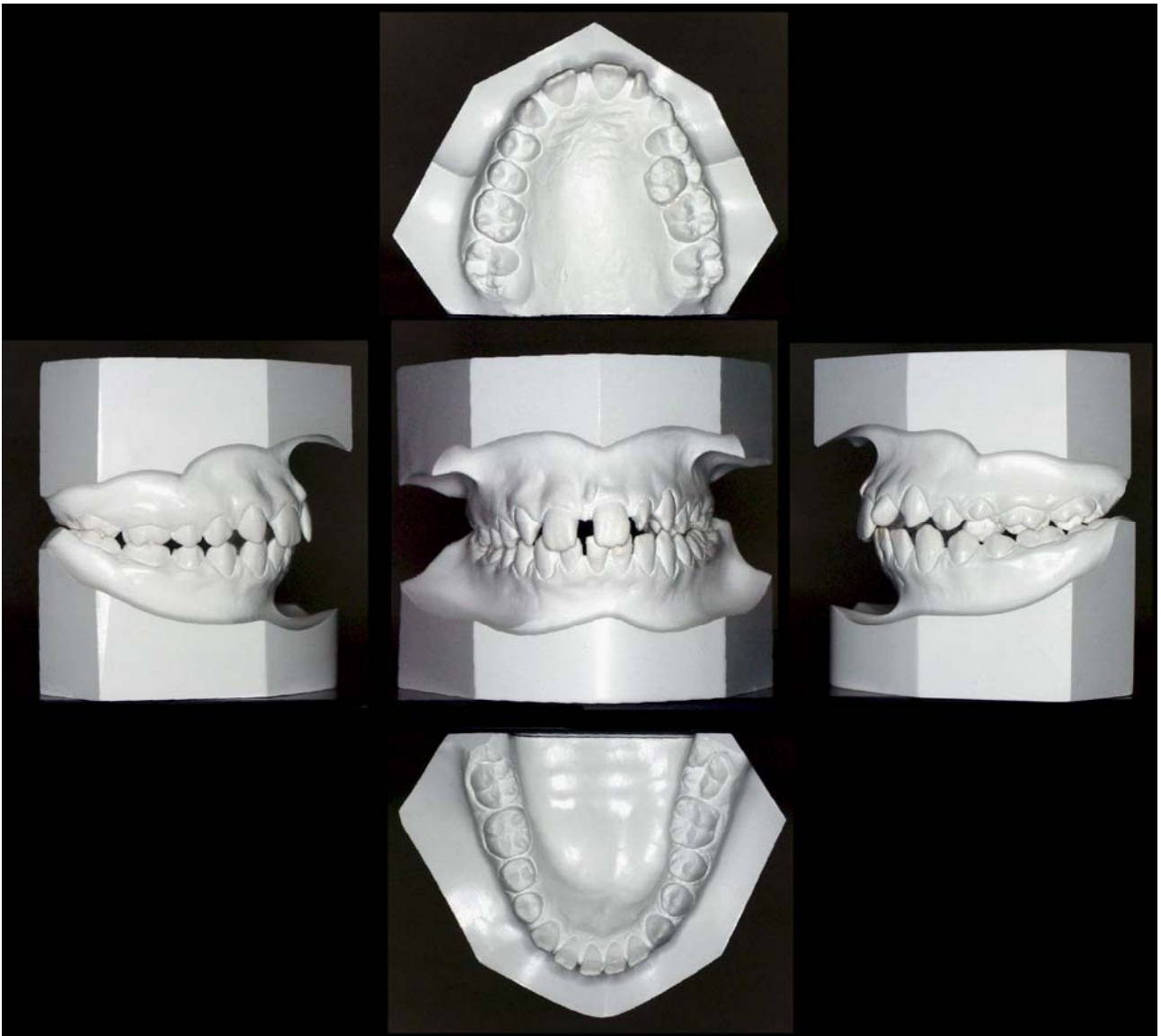
Extra-oral and intra-oral photographs



Case ID 18 - ST
DOB 04 01 1991
Age 11.10 years
Sex Female

Status Pre-treatment
Date 02 12 2002

Study Models



Case ID 18 - ST
DOB 04 01 1991
Age 11.10 years
Sex Female

Status Pre-treatment
Date 02 12 2002

Orthopantogram



Congenitally missing upper right lateral incisor.

Case ID 18 - ST
DOB 04 01 1991
Age 11.10 years
Sex Female

Status Pre-treatment
Date 02 12 2002

Lateral Cephalogram



Case ID 18 - ST
DOB 04 01 1991
Age 11.10 years
Sex Female

Status Pre-treatment
Date 02 12 2002

Cephalometric Analysis

Ricketts Analysis

Parameter	Mean	Adjusted Mean	Measurement	Notable Difference
Chin in Space				
Facial Axis	90 ° ± 3.5 °	No adjustment	92 °	
Facial Depth	87 ° ± 3.0 °	+ 1 ° every 3 years	88 °	
Mandibular Plane	26 ° ± 4.5 °	- 1 ° every 3 years	17 °	**
Convexity				
Convexity of A Point	2 mm ± 2 mm	- 1 mm every 3 years	+ 6 mm	**
Teeth				
Lower Incisor to A-Pog	1 mm ± 2 mm	No adjustment	+ 6 mm	***
Lower Incisor Inclination	22 ° ± 4.0 °	No adjustment	30 °	**
Upper Molar to PtV	Age + 3 mm	+ 1 mm per year	16 mm	
Profile				
Lower Lip to E Plane	- 2 mm ± 2 mm	Reduces with growth	+ 2 mm	**

Summary of Findings

1. Class II skeletal pattern - maxilla protrusive
2. Brachyfacial
3. Dentition protrusive
4. Lower lip protrusive



AUSTRALASIAN ORTHODONTIC BOARD

APPLICATION FOR AOB CERTIFICATION (Form 3)

Within **three years** of obtaining AOB First Stage, and as soon as you have accumulated the required number of **Professional Development Points** and **completed your two Board Cases**, you should collect post-treatment records, analyze treatment, and apply for AOB Certification.

Submit to your State Convenor³:

- **Form 3 - Application for AOB Certification**
- **Professional Development Log**⁴
- **Pre-treatment and post-treatment records**⁵ for each of your two **Board Cases**
Label the records with the patient initials. An overall standard reflecting the AOB theme (Excellence, Education and Review) is expected. Include an appraisal of the orthodontic treatment and its outcome.

Use the **Professional Development Log** to provide a formal record of professional development. You must accumulate at least **20 points** during each AOB Certification period.

Applicant

Last Name		First Name	
Membership Status		State Branch	
AOB Number			

Nominated Board Cases

	Case ID	Malocclusion	Treatment	Appliance
1	18 - ST	Class II Div 1 - Missing 12	Fixed appliances	Straight wire
2				

Self Appraisal

Please proceed to Page 2 for self appraisal.

Upon receipt of the above, your State Convenor will arrange for your two Board Cases to be assessed by AOB-appointed peers. **Assessment will be anonymous and non-graded.** When your two Board Cases have been assessed, the case records and an evaluation report will be returned to you.

You will be notified when you have received AOB Certification.

³ Contact details of State Convenors are listed on the AOB website at www.aso.org.au/aob.

⁴ The Professional Development Log may be downloaded from the AOB website at www.aso.org.au/aob.

⁵ Stipulated requirements for records are listed on the AOB website at www.aso.org.au/aob.

Case ID 18 - ST
DOB 04 01 1991
Age 14.3 years
Sex Female

Status Post-treatment
Date 11 04 2005

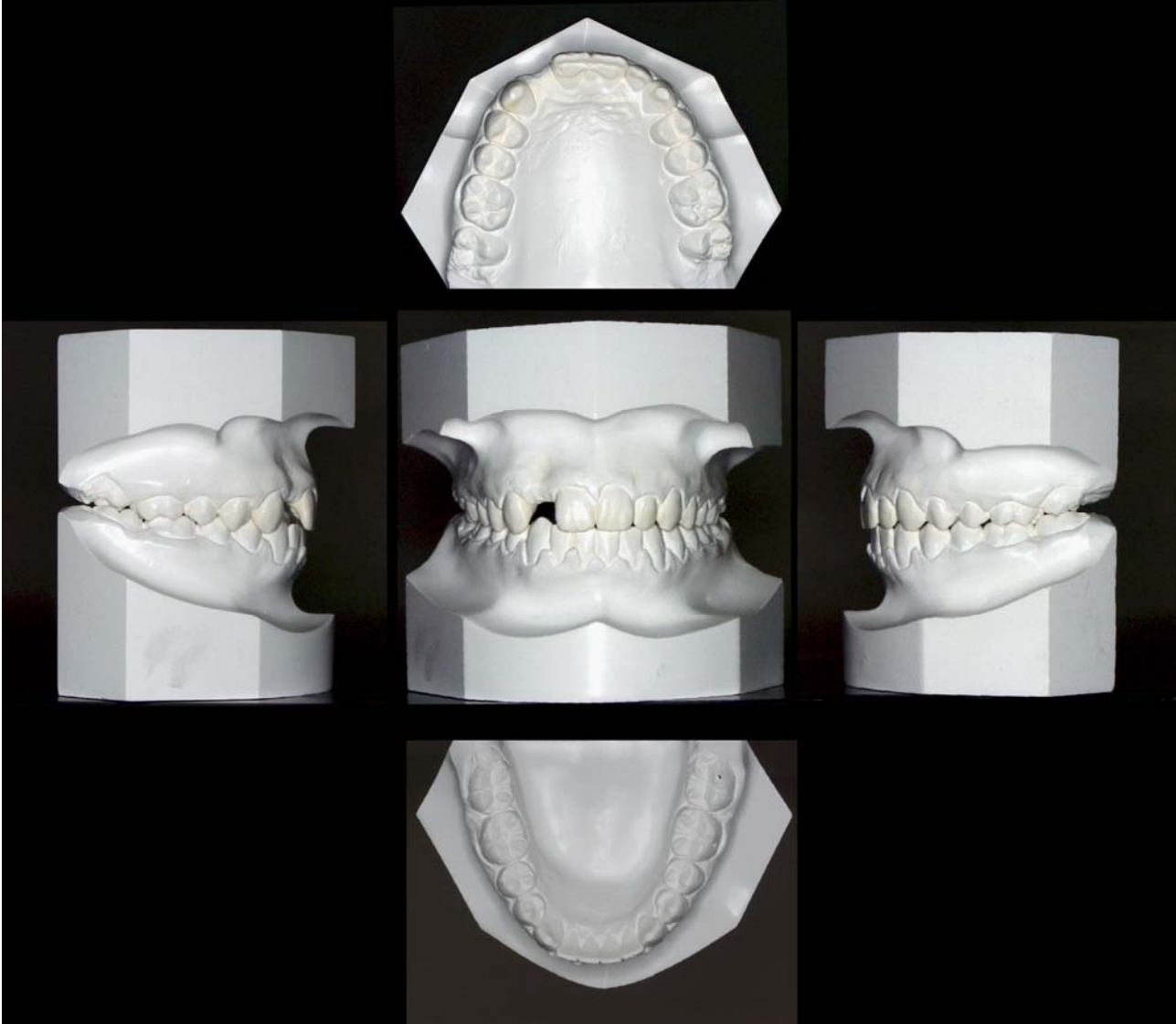
Extra- and Intra-oral photographs



Case ID 18 - ST
DOB 04 01 1991
Age 14.3 years
Sex Female

Status Post-treatment
Date 11 04 2005

Study Models



Case ID 18 - ST
DOB 04 01 1991
Age 14.3 years
Sex Female

Status Post-treatment
Date 11 04 2005

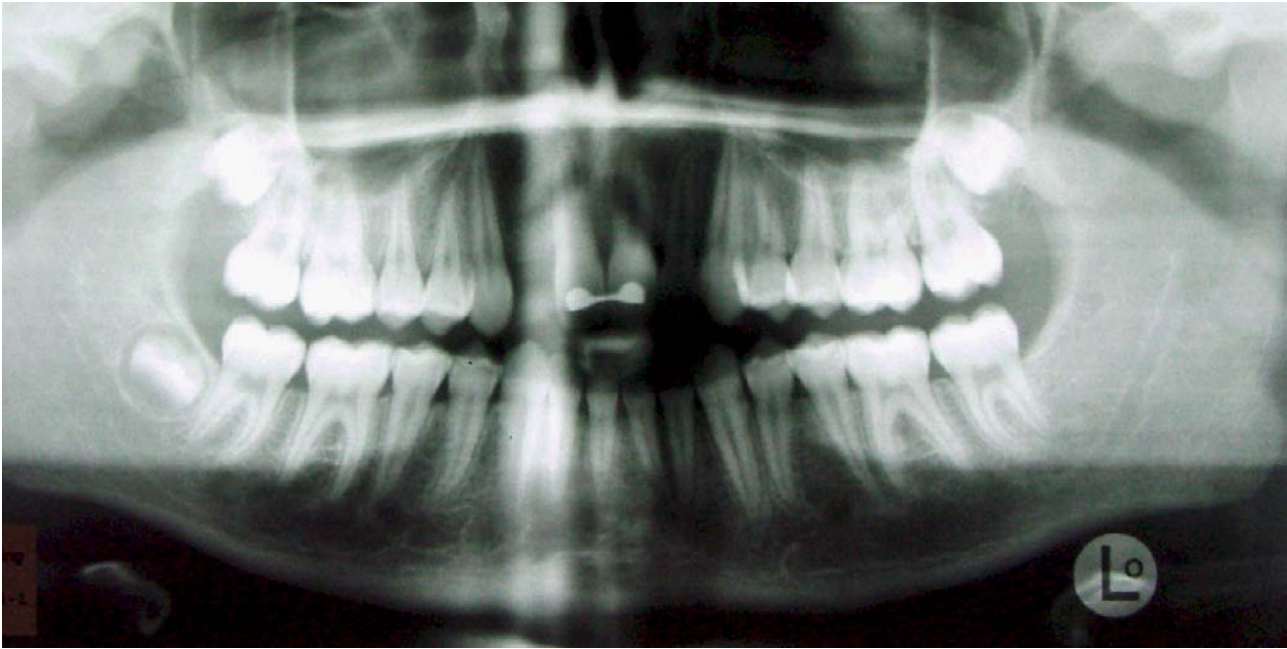
Lateral cephalogram



Case ID 18 - ST
DOB 04 01 1991
Age 14.3 years
Sex Female

Status Post-treatment
Date 11 04 2005

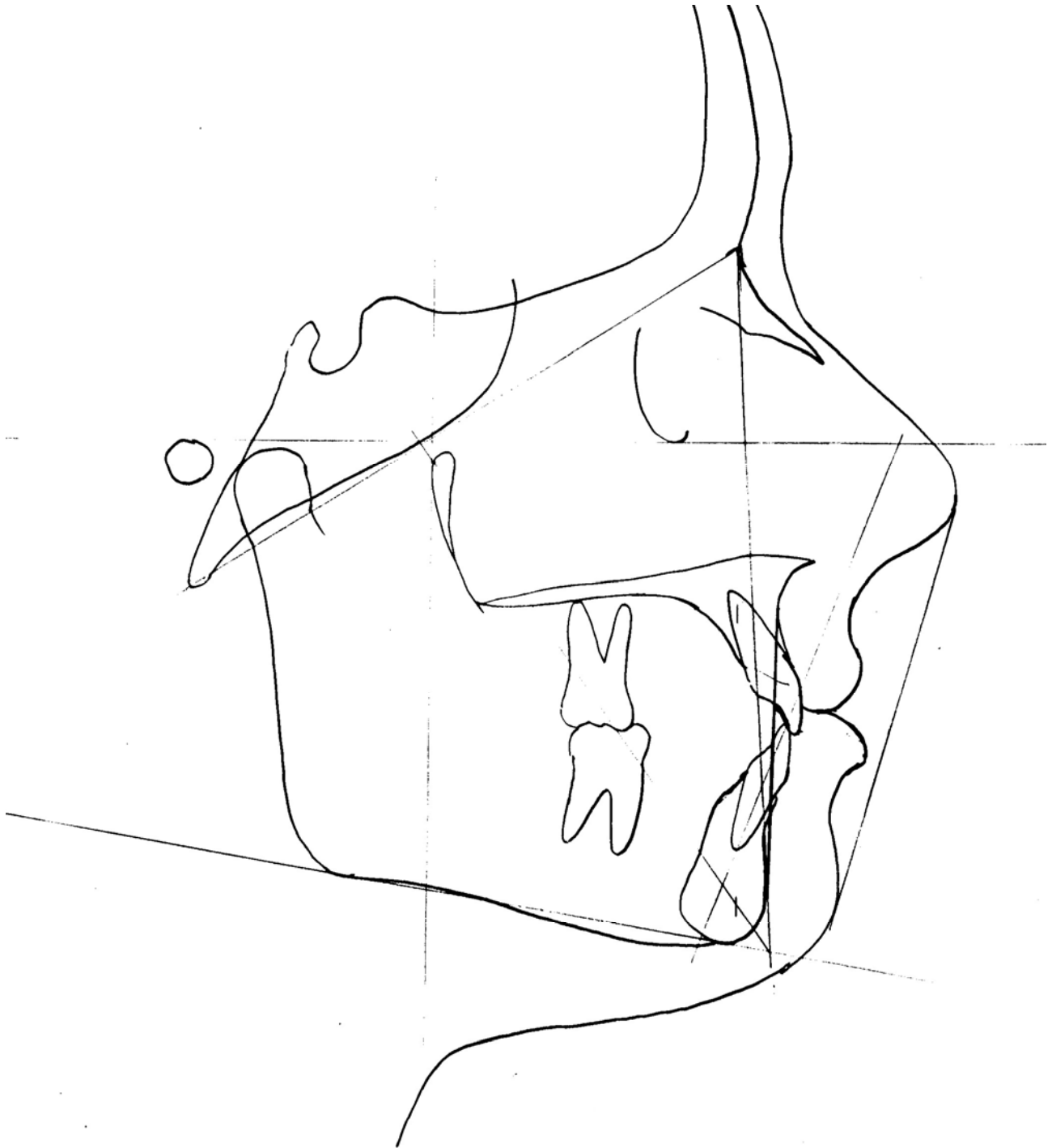
Orthopantogram



Case ID 18 - ST
DOB 04 01 1991
Age 14.3 years
Sex Female

Status Post-treatment
Date 11 04 2005

Cephalometric tracing



Case ID 18 - ST
DOB 04 01 1991
Age 14.3 years
Sex Female

Status Post-treatment
Date 11 04 2005

Cephalometric Analysis

Ricketts Analysis

Parameter	Mean	Adjusted Mean	Measurement	Notable Difference
Chin in Space				
Facial Axis	90 ° ± 3.5 °	No adjustment	92 °	
Facial Depth	87 ° ± 3.0 °	+ 1 ° every 3 years	93 °	*
Mandibular Plane	26 ° ± 4.5 °	- 1 ° every 3 years	11 °	***
Convexity				
Convexity of A Point	2 mm ± 2 mm	- 1 mm every 3 years	+ 4 mm	**
Teeth				
Lower Incisor to A-Pog	1 mm ± 2 mm	No adjustment	+ 2 mm	
Lower Incisor Inclination	22 ° ± 4.0 °	No adjustment	20 °	
Upper Molar to PtV	Age + 3 mm	+ 1 mm per year	22 mm	
Profile				
Lower Lip to E Plane	- 2 mm ± 2 mm	Reduces with growth	- 2 mm	

Summary of Findings

1. Class II skeletal pattern - maxilla protrusive
2. Brachyfacial
3. Dentition well positioned
4. Lower lip well positioned