There are some peculiar restrictions on the occurrence of impersonal *si* in untensed and tensed clauses with specific time reference in Italian that have gone largely unnoticed in the literature and are not expected under the standard analysis of the construction. I will show that they are in fact simple consequences of very general principles, θ-theory and Case theory, under a finer analysis of impersonal *si*: one that provides, among other things, for two distinct uses of the morpheme, as an argument and as a nonargument. Although it introduces a further distinction in the class of *si* constructions, this analysis is in principle compatible with the program of unifying all uses of *si* (impersonal, middle, and reflexive).¹ The unification approach and the one pursued here simply set themselves at different levels of abstraction.

After reviewing the fundamental restrictions on impersonal *si* in untensed clauses (section 1), I will suggest an analysis that accounts for them via principles that are already independently justified (section 2). In section 3 I will discuss the differences in the interpretation of impersonal *si* in finite clauses with specific and generic time reference, relating these differences to the same analysis in interaction with a more general theory of "arbitrary" (*arb*) interpretation. In section 4 I will reexamine so-called passive *si*, reinterpreting it in part in the light of the preceding results on impersonal *si*. In section 5 I will offer some (provisional) comparative remarks on impersonal *si* constructions in other Romance languages. Finally, in section 6 I will take up the general question of the parametrization and acquisition of the various usages of *si*.

The original nucleus of this analysis was presented in May 1982 at the University of Paris VIII during a course on Italian syntax given jointly with Luigi Rizzi. Subsequent reelaborations were presented in talks at MIT (October 1982), at the Scuola Normale Superiore (February 1983), and at the GLOW conference in Barcelona (March 1986). I am indebted to those audiences, and in particular to Adriana Belletti, Paola Benincà, Luigi Burzio, Carmen Dobrovie-Sorin, Richard Kayne, Giuseppe Longobardi, Maria Rita Manzini, and Luigi Rizzi. I must also thank Luigi Burzio, Anna Cardinali, Richard Kayne, Luigi Rizzi, Anne Zribi-Hertz, and two LI reviewers for their comments on an earlier version of the article.


As far as I can see, the analysis of *si* developed here is immediately compatible only with the unification approach of Kayne (1986).
1. Some Unexpected Asymmetries

In tensed contexts impersonal *si* is found to occur with all major verb classes in Italian (transitive, unergative and ergative intransitive, psych-movement, copulative, passive, and raising verbs):^2

(1) a. (Trans) (Prima o poi) *si* scopre sempre il colpevole.
   ‘(Sooner or later) one always discovers the culprit.’

b. (Unerg) *Si* lavora sempre troppo.
   ‘One always works too much.’

c. (Erg) Spesso *si* arriva in ritardo.
   ‘Often one arrives late.’

d. (Psych) Spesso *si* preoccupa anche chi non si vorrebbe.^3
   ‘Often one worries even those one would not like to.’

e. (Cop) Non *si* è mai contenti.^4
   ‘One is never satisfied.’

f. (Pass) *Si* è spesso trattati male.
   ‘One is often ill-treated.’

g. (Rais) Spesso *si* risulta non essere in regola.
   ‘One often turns out not to be in order.’

In untensed control clauses, on the other hand, it is uniformly excluded:

(2) a. (Trans) *Sarebbe meglio scoprir*si il colpevole.
   ‘It would be better one to discover the culprit.’

b. (Unerg) *Sarebbe meglio lavorar*si un po’ di più.
   ‘It would be better one to work a bit more.’

c. (Erg) *Sarebbe meglio arrivar*si puntuali.
   ‘It would be better one to arrive on time.’

---

^2 This in itself is problematic for any analysis that regards *si* as an argument [NP,IP] clitic base-generated in Infl or in clitic position, since one would expect a θ-Criterion violation at D-Structure in all those cases where the verb assigns no θ-role to [NP,IP] (contexts (1c–g)).

This fact is explicitly recognized by Burzio (1986, 45f.) and Belletti (1982a, fns. 21, 37, Appendix), who suggest two different solutions to this problem. The former, following Rizzi (1976), assumes that *si* can be base-generated in any NP position, though it cliticizes (after possible applications of NP Movement) only from the preverbal subject position. The latter assumes *si*-insertion into Infl at S-Structure, where the internal argument is also changed from [PRO] to [e], with consequent transmission of its θ-role to *si*.

Manzini (1983; 1986, 243) adopts yet another solution, whereby in such cases as (1c,f) *si* is taken to enter a chain with both the object and the subject.

Here I will pursue a rather different approach, one that may extend to the infinitival cases to be discussed shortly in the text.

^3 Here and below Psych refers just to the class of psych-movement verbs of Belletti and Rizzi (1986) that assign (inherent) accusative Case to the experiencer and select auxiliary avere ‘have’ despite their taking only internal arguments. The class assigning (inherent) dative Case and selecting auxiliary essere ‘be’ appears to be nondistinct from the wider class of ‘ergative’ verbs.

^4 Copulative verbs are kept distinct here from Raising verbs, but it should be noted that ample evidence has been accumulated for analyzing them as Raising verbs. See Couquaux (1979; 1981), Stowell (1981), Burzio (1981), Rizzi (1982c), Kayne (1985), among others.
d. (Psych) *Sarebbe meglio non essersi preoccupato nessuno.
   ‘It would be better one not to have worried anybody.’

e. (Cop) *Sarebbe meglio essersi ricchi.
   ‘It would be better one to be rich.’

f. (Pass) *Sarebbe meglio essersi aiutati da qualcuno.
   ‘It would be better one to be helped by someone.’

g. (Rais) *Sarebbe meglio risultarsi essere in regola.
   ‘It would be better one to appear to be in order.’

The ungrammaticality of (2) is standardly attributed to a violation of the Case Filter
(Burzio (1986, 44), Zubizarreta (1982, 146), Manzini (1983; 1986), Everett (1984)). As
a clitic, a lexical nominal element, *si must be part of a CHAIN assigned Case, if it is
to satisfy the Case Filter. Being in a CHAIN with the preverbal subject position, it is
predicted to occur only in environments in which Case is assigned to that position—
hence, not in infinitival control clauses, in which the preverbal subject position fails to
be assigned one.

If this analysis is correct, impersonal *si should then be possible in those untensed
clauses in which the preverbal subject position is (part of a CHAIN) assigned Case (in
some special manner). Two such untensed clause environments are (a) infinitival com-
plements to Raising verbs (Chomsky (1981, 266f.)) and (b) untensed clauses involving
Aux-to-Comp (Rizzi (1981; 1982a, chap. 3)). Consider (3), an example of the first case:

(3) e, sembrano [e$^k$ esserne arrivati molti$^k$]
    seem to be of-them arrived many
    ‘It seems many have arrived.’

After Raising, the preverbal subject NP of the infinitival complement is part of a chain
that receives Case (nominative). (3) further shows that a lexical argument in a CHAIN

5 Concerning (2a), see the more detailed discussion in section 4 on transitive environments. The incompati-
ability of control PRO and *si in these cases has also been attributed to the (illicit) government of PRO by
*si (see Rizzi (1982b)). In this view, (i) would differ minimally from (ii) in that PRO is governed in the former,
though not in the latter, in violation of binding theory:

(i) *Loro vorrebbero [PRO invitarsì].
    ‘They would like *si to invite (‘to be invited’).’

(ii) Loro vorrebbero [PRO esser invitati].
    ‘They would like to be invited.’

Burzio (1981; 1986, 78, fn. 41) notes, however, that the same contrast is preserved even if PRO undergoes
Raising, which has the effect of rendering PRO ungoverned (see also Chomsky (1981, 63f., 141, fn. 43)).
Compare (iii) and (iv):

(iii) *Loro vorrebbero [PRO risultare [t essersi invitati]].
    ‘They would like to appear *si to have invited (‘to have been invited’).’

(iv) Loro vorrebbero [PRO risultare [t essere stati invitati]].
    ‘They would like to appear to have been invited.’

This suggests a different approach (see Burzio (1981; 1986) and section 4 in the text). One must also exclude
the possibility of *si appearing in infinitival contexts in a CHAIN, not with PRO, but with whatever empty
category is found in the corresponding tensed clauses. Case considerations seem to suffice, providing a unitary
answer to both problems.
with it also counts as part of the same chain (Chomsky (1986a, sec. 3.4.3), coming to
"inherit" the Case (nominative) assigned to the head of the chain and thus complying
with the Case Filter. Hence also the "curious" phenomenon of the matrix verb in (3)
agreeing with the embedded VP-internal NP.

The second environment in which the preverbal subject NP of an untensed clause
receives nominative Case is represented by the small number of constructions studied
by Rizzi (1981; 1982a, chap. 3) that allow for an auxiliary to move to Comp (= C of
Chomsky (1986b)).

The Aux-to-Comp option is allowed (at its peculiar stylistic level) in the infinitival
complement of "verbs of thinking" (4a), in adjunct gerundive clauses (4b), in "nomi-
nalized" infinitives (4c), and in the infinitival complement of certain nonsubcategorized
prepositions (4d):

(4) a. Ritenevano [\textit{CP} non esser [\textit{IP} io/Gianni t idoneo a tale compito]].
    "They thought I/Gianni not to be suitable for that task."

b. [\textit{CP} Non essendo [\textit{IP} io/Gianni t idoneo a tale compito]], . . .
    "I/Gianni not being suitable for that task, . . ."

c. [\textit{NP} L' [\textit{CP} esser [\textit{IP} io/Gianni t disposto ad aiutarti]]], . . .
    "I/Gianni being willing to help you, . . ."

d. [\textit{PP} Per [\textit{CP} non esser [\textit{IP} io/Gianni t disposto ad aiutarti]]], . . .
    for not being I/Gianni willing to help you
    "As I/Gianni was not willing to help you, . . ."

The prediction that impersonal \textit{si} will be found in Raising and Aux-to-Comp environ-
ments (as opposed to control infinitives) is indeed fulfilled, \textit{but only in part}. Though it
is grammatical, in such contexts, with transitives and unergative intransitives, it is un-
grammatical with all other verb classes. See (5) and (6)/(7) (I limit the exemplification
of the Aux-to-Comp environment to the infinitival complement of "verbs of thinking"
(6) and to the gerundive (7) constructions):

(5) a. (Trans) Sembra non essersi ancora scoperto il vero colpevole.
    "It seems one not to have yet discovered the true culprit."

b. (Unerg) Sembra non essersi lavorato a sufficienza.
    "It seems one not to have worked sufficiently."

c. (Erg) *Sembra essersi arrivati troppo tardi.
    "It seems one to have arrived too late."

d. (Psych) *Sembra essersi preoccupato solo un genitore.\textsuperscript{6}
    "It seems one to have worried only one parent."

\textsuperscript{6} (5d), (6d), and (7d), are acceptable, in an irrelevant reading, with "inchoative" \textit{preoccuparsi} 'worry'
(\"It seems that only one parent got worried\") (see Belletti and Rizzi (1986)). What is crucial is that they cannot
be interpreted as instances of impersonal \textit{si}. Thus, (5d) cannot mean "It seems one worried only one parent."
e. (Cop) *Sembra non essersi benvenuti qui.
   'It seems one not to be welcome here.'

f. (Pass) *Sembra non essersi stati invitati da nessuno.
   'It seems one not to have been invited by anybody.'

g. (Rais) *Sembra non risultarsi ignorare il problema.
   'It seems one not to appear to ignore the problem.'

(6) a. (Trans) Ritengo non essersi ancora scoperto il vero colpevole.
   'I believe one not to have discovered the true culprit.'

b. (Unerg) Ritengo non essersi provveduto alle sue necessità con la dovuta solerzia.
   'I believe one not to have taken care of his needs with due zeal.'

c. (Erg) *Ritengo non essersi arrivati in sufficiente anticipo.
   'I believe one not to have arrived sufficiently ahead of time.'

d. (Psych) *Ritengo essersi preoccupato solo un genitore.
   'I believe one to have worried only a parent.'

e. (Cop) *Ritengo non essersi idonei per tale compito.
   'I believe one not to be suitable for that task.'

f. (Pass) *Ritengo non essersi stati trattati col dovuto rispetto.
   'I believe one not to have been treated with due respect.'

g. (Rais) *Ritengo non essersi risultati essere in regola.
   'I believe one not to have turned out to be in order.'

(7) a. (Trans) Non essendosi ancora scoperto il vero colpevole, . . .
   'One not having (lit.: being) yet discovered the true culprit, . . .'

b. (Unerg) Non essendosi provveduto alle sue necessità con la dovuta solerzia, . . .
   'One not having taken care of one’s needs with due zeal, . . .'

As noted by Gracia i Solè (1986, 245ff.), Belletti and Rizzi’s (1986) analysis of psych-movement verbs can be extended to the class of “measure verbs” (pesare ‘weigh’, misurare ‘measure’, valere ‘be worth’, and so on) (see also Burzio (1981, 490, fn. 7; 1986, 314, fn. 34)). In their nonagentive use, their surface subject appears to be a theme (see Jackendoff (1972, 44)) and should thus be mapped to the internal object position at D-Structure. The measure phrase is assigned inherent accusative Case VP-internally (Cento chili, non li pesa di certo ‘A hundred kilos, he does not weigh them(acc.), certainly’; Non li misura, due metri ‘He does not measure them(acc.), two meters’, and so on). Under this analysis, no θ-role is assigned to [NP,IP], whence the non-passivizability of these verbs (*Cento chili sono pesati da poche persone ‘A hundred kilos are weighed by few people’; *Due metri erano misurati solo dal tavolo ‘Two meters were measured only by the table’, and so on). See Gracia i Solè (1986).

It is interesting to note that the behavior of these verbs under impersonal si is exactly parallel to that of psych-movement verbs selecting auxiliary avere. Compare (i) and (ii):

(i) Quando si misura solo un metro, non si può essere prepotenti.
   'When one measures only one meter, one cannot be a bully.'

(ii) a. *Qui risulta non misurarsi più di un metro.
   'Here it seems not si measures more than one meter.'

b. *Ritengo non essersi mai misurato più di un metro in quel paese.
   'I deem never si to have measured more than one meter in that country.'
c. (Erg) *Non essendosi morti in giovane età, . . .
   'One not having died young, . . .'

d. (Psych) *Essendosi preoccupato solo un genitore, . . .
   'One having worried only a parent, . . .'

e. (Cop) *Non essendosi contenti del proprio lavoro, . . .
   'One not being happy with one’s work, . . .'

f. (Pass) *Non essendosi stati invitati da nessuno, . . .
   'One not having been invited by anybody, . . .'

g. (Rais) *Essendosi risultati a tutti essere in regola, . . .
   'One having appeared to everybody to be in order, . . .'

Such an asymmetry, in untensed clauses, between transitives and unergatives, on the one hand, and all other verb classes, on the other, is unexpected under the standard analysis, especially if one compares these structures with their tensed counterparts, which are grammatical. The three solutions to the thematic problem mentioned in footnote 2 clearly do not lead one to expect any difference between tensed clauses and untensed clauses in which nominative Case is assigned to [NP,IP].

2. A Finer Analysis of Impersonal Si

2.1. Argument and Nonargument Si

The facts reviewed in section 1 pose essentially two problems:

---

7 Although still unacceptable, (7c–g) sound somewhat better than the corresponding cases of (6). This can be attributed to the fact that “referential” pro-drop (in the sense of Rizzi (1982a, chap. 4)) is excluded more strongly in infinitival than in gerundive Aux-to-Comp constructions. See the contrast between (ia) and (ib), whose incomplete unacceptability recalls the marginal possibility of pro-drop with absolute past participles (see Belletti (1983, 23), which is the source of (ic)):

   (i) a. (Quanto a Carla,) *Ritenevano non esser e, degna di stima.
      'Concerning Carla') They believed not to be worthy of esteem.'
   b. (Quanto a Carla,) ??Non essendo e, degna di stima, si ritennero liberi di assumere qualcun altro.
      'Concerning Carla) Not being worthy of esteem, they felt free to appoint someone else.'
   c. (A proposito della ben nota sfortuna di Maria) ??Appena uscita di casa, cominciò a piovere.
      'Concerning Maria’s notorious bad luck) Once out of her house, it began to rain.'

That is to say, gerundive Aux-to-Comp (and absolute past participle) constructions are, as it were, more like tensed clauses than are infinitival Aux-to-Comp constructions—hence their contrast, in the expected direction, also in the domain of impersonal si.

8 As noted by Burzio (1986, 291ff.) and Manzini (1986, 244), impersonal and passive si are not possible in untensed clauses in which the preverbal subject position is (part of a CHAIN) assigned accusative, rather than nominative, as in the complement of perception verbs:

   (i) *Ho visto [e ballarsi freneticamente].
      'I have seen e to dance frenetically.'
   (ii) *Ho visto [Carlo, invitarsi e, malvolentieri].
      'I have seen Carlo e to invite ("be invited") unwillingly.'

This could be taken to suggest that [+arg] si requires not just any Case, but nominative Case. See Burzio (1986, 50) and, for a different account, Manzini (1986, 253). See also Keyser and Roeper (1984, 386), where a similar observation is made about English middles, and footnote 48 for the occurrence of middle si in such an environment.
(I) Why is there an asymmetry in nonfinite clauses between transitive and unergative verbs, on the one hand, and all other verb classes, on the other?

(II) Why is such an asymmetry absent from finite clauses?

Concerning (I), one may immediately exclude that Case considerations play any role. Si is in every case part of a CHAIN assigned nominative Case.

The natural domain to refer to is instead θ-theory. We know independently that transitive and unergative verbs differ from all the other verb classes in being the only verb types that assign one of their θ-roles externally (Williams (1981)). If si is an argument, by the θ-Criterion under the Projection Principle, it must be associated with a θ-role at every level of representation, including D-Structure. As an [NP,IP] clitic, it must in particular be associated with the θ-role assigned by the verb (via the VP) to the [NP,IP] position, namely, the external θ-role.

This predicts that si will be possible only in those contexts where an external θ-role is assigned, that is, in clauses with transitive and unergative verbs. In every other case a θ-Criterion violation will take place at D-Structure. (I crucially assume that si cannot be sometimes an [NP,IP] clitic and sometimes an [NP,VP] clitic, matched with an internal θ-role. An ambivalence of this kind would be entirely unprecedented for a clitic.)

Thus, if we analyze si as an argument clitic coindexed with [NP,IP] (and Agr), we have an immediate and simple solution for problem (I).

It may be noted that the grammaticality pattern of (5) and (6)/(7) reproduces itself in the passive (in languages that also allow for impersonal passives). See for instance the case of German in (8) and that of French in (9):

(8) a. (Trans) Er wird eingeladen.  'He is invited.'

b. (Unerg) Es wird getanzt. 'It is danced.'

c. (Erg) *Es wird angekommen. 'It is arrived.'

9 German "impersonal/middle" sich displays exactly the same asymmetry. See (i), from Boschetti (1986, 147ff.):

(i) a. Diese Bücher lesen sich gut. 'These books read sich well.'

b. Hier tanzt es sich gut. 'Here it dances sich well.'

c. *Hier kommt es sich schnell an. 'Here it arrives sich quickly.'

d. *Hier ist es sich nur schwer zufrieden. 'Here it is sich happy with difficulty.'

e. *Hier wird es sich schlecht versorgt. 'Here it is sich supplied badly.'

f. *Daß es sich nie scheint, ordnungsgemäß zu handeln, ... 'That it sich never seems to behave properly, ...'

Haider and Rindler-Schjerfve (1985) also note the impossibility of middle sich with ergatives. See also Haider (1985), Abraham (1986; 1987) for general discussion.
d. (Psych) *Er wird gerührt.
   'He is moved.'

e. (Cop) *Es ist glücklich gewesen.
   'It has been happy.'

f. (Pass) *Es ist eingeladen worden.
   'It has been invited.'

g. (Rais) *Es wird (von ihnen) glückliche Menschen zu sein geschienen.
   'It has appeared (by them) to be happy people.'

(9) a. (Trans) Il a été invité.
   'He was invited.'

b. (Unerg) Il a été fumé récemment dans cette cuisine.
   'It was smoked recently in this kitchen.'

c. (Erg) *Il a été arrivé à la fête très tard le soir.\(^{10}\)
   'It was arrived at the party very late in the evening.'

d. (Psych) *Il (expletive) a été très ému par cette catastrophe.
   'It was very much moved by this catastrophe.'

e. (Cop) *Il (expletive) n’a jamais été heureux dans cette maison.
   'It was never happy in this house.'

f. (Pass) *Il a été été invité dernièrement.
   'It has been been invited lately.'

g. (Rais) *Il n’a jamais été semblé être heureux dans cette maison.
   'It has never appeared to be happy in this house.'

The impossibility of passivizing ergative, psych-movement, copulative, passive, and raising verbs analogously follows if one assumes, as often proposed (for example, by Jaeggli (1981; 1986a), Roberts (1985)) that passive morphology necessarily "absorbs," or "suspends" at D-Structure, the θ-role that would otherwise be externalized. For passive morphology to absorb or suspend it, there must be an external θ-role at D-Structure to begin with—hence the ill-formedness of the (c–g) examples of (8) and (9), which contain predicates that do not assign one. If passive morphology and "impersonal *si*" both have the effect, among others, of "dethematizing" the [NP,IP] position (see section 2.4), it is not surprising that they behave alike with respect to θ-requirements.

A difference between *si* and passive morphology remains, but it is peripheral. As an argument, *si* must retain the external θ-role that it "absorbs," whereas passive morphology need not, if it is not an argument. In the latter, then, though not in the former,

\(^{10}\) For the impossibility of passivizing what later came to be recognized as ergative ("unaccusative"), as opposed to unergative, verbs, see Kayne (1977, chap. 3, fn. 56). See also Zribi-Hertz (1982, 368), Grewendorf (1984, 18), Pollock (1985, sec. 6.1), Haider and Rindler-Schjerve (1985), Dobrovie-Sorin (1987, 492), among others. See Perlmutter (1978) for a different account of this fact. Nonetheless, a number of exceptions are reported in the literature. See Ruwet (1987, fn. 5) and references cited there. Milan (1985, 75) reports the possibility in German of such forms as *Hier wird nur gestorben* 'Here it is only died', containing an apparently ergative verb in the impersonal passive form.

Roberts (1987) discusses the apparent existence of passives of passives in certain languages, suggesting possible ways to reconcile this case with standard analyses of the passive in Government-Binding Theory.
the external \( \theta \)-role may be reassigned to another position. Compare (10a) with (10b),
and see Belletti (1982a, 7f.), Jaeggli (1986a, sec. 4):\(^{11}\)

(10) a. Gestern wurde von allen getanzt.
   b. *Ieri si è ballato da tutti. (\( \neq \) chez tous)
   ‘Yesterday it was danced by everybody.’

This analysis does not yet offer a solution to problem (II). Rather, it predicts that the
same asymmetry should also be found in finite clauses, contrary to fact.

In spite of this, I will assume the foregoing to be a correct consequence and that
what is ‘surprising’ is the behavior of finite clauses (as in (I)), not that of nonfinite
clauses (as in (5), (6)/(7)).

The analysis of impersonal \( si \) that I have followed so far, essentially based on the
standard analysis, is given in (11) (I defer a more detailed discussion of each choice,
and of its possible alternatives, to section 2.3):

(11) \textit{Impersonal si}
   a. syntactically
      i. argument
      ii. clitic pronoun coindexed with [NP,IP] (and, by transitivity, with Agr,
          when present)
   b. morphologically
      i. person: unspecified (hence, \textit{generic} or \textit{arb})
      ii. number: plural
      iii. gender: masculine
   c. semantically
      \([ + \text{human}]\)

As noted, the assumption that \textit{si} is an argument and a clitic coindexed with [NP,IP]
provides an account for the asymmetry present in (5) and (6)/(7). This analysis implies,
however, that \textit{si} cannot be an argument in (1c–g). If it were, the \( \theta \)-Criterion would be
violated at D-Structure. Rather, in (1c) (repeated in (12), which I now take to represent
all of (1c–g)), the argument at D-Structure must be found in [NP,VP], the only position
to which a \( \theta \)-role is assigned (compare (13)):

(12) Spesso si arriva in ritardo.
   ‘Often one arrives late.’
(13) [spesso \( e _{i}^{k} \) Agr\( ^{k} \) si\( ^{k} \) arriva \( e _{i} \) in ritardo]

\(^{11}\) Some languages have only agentless passives (see Eckman (1974), Siewierska (1984, 35)). Perhaps a
parameter is involved, whereby passive morphology can optionally count as an argument, thus retaining the
external \( \theta \)-role.

Note also that, in more rhetorical styles of Italian, \textit{by}-phrases are found to cooccur with \textit{si}, as observed
by Lepschy (1986, fn. 4) (see also Ruwet (1972), Fellbaum and Zribi-Hertz (1987, fn. 7) for a similar observation
concerning French). It is however interesting that all of the examples cited are instances of what I analyze
below as ‘middle’ \textit{silse}, which is a nonargument. Apparently, one does not find \textit{by}-phrases in sentences of
the strict ‘impersonal’ type (such as (10b)).
What element in the class of empty categories can $e_i$ be? It cannot be a variable, since no operator is present that can $\Lambda$-bind it at S-Structure and LF. It cannot be PRO, since it is governed, whether it remains in situ or moves to [NP,IP]. It cannot be NP-trace, since this element does not qualify as an argument. It can only be pro, which by S-Structure must be in [NP,IP] to be identified (as a generic pronominal) after entering a CHAIN with Agr and $s$.  

Let us assume, then, that the argument or nonargument status of impersonal $s$ is the result of a parametric choice, replacing (11) by (14) (we shall see that the parameter is also relevant for the other uses of $s$; see Haider and Rindler-Schjerve (1985)):  

(14) Impersonal $s$

a. syntactically
   i. ± argument
   ii. clitic pronoun coindexed with [NP,IP] (and, by transitivity, with Agr, when present)

b. morphologically
   i. person: unspecified (hence, generic or arb)
   ii. number: plural
   iii. gender: masculine

c. semantically
   [+ human]

The parameter gives rise to two uses of impersonal $s$ that share all features except for those following from the positive or negative specification of the parameter. In particular, [+arg(ument)] $s$ will require association with a $\theta$-role at every level of representation, whereas [-arg(ument)] $s$ clearly will not. What purpose is then served by [-arg] $s$?

I suggest that it serves as a syntactic means to supplement personal Agr with the features able to "identify" (in the sense of Chomsky (1982, chap. 5), Rizzi (1986)) the content of pro as an unspecified (generic) person pronoun, an interpretation that would not otherwise be available to the ordinary person inflection paradigm. Arriva can only mean 'he/she arrives', whereas $s$ arriva acquires the meaning 'one (unspecified) arrives'.

As a syntactic marker for unspecified (generic) person, it is natural to assume that [-arg] $s$ will need to combine with personal Agr. In structural terms, this can be expressed by saying that it needs to govern personal Agr and/or be governed by it, depending on whether it is in Infl or not.\textsuperscript{12}

\textsuperscript{12} Chomsky (1981), following Belletti (1982a), assumes impersonal $s$ to be in Infl. Manzini (1983; 1986) and Rizzi (1986, fn. 18) note that the most plausible S-Structure position of $s$ is under VP, not Infl, since it clusters with object clitics.

The assumption that $s$ is in Infl at S-Structure can, however, be maintained if object clitics in Romance can themselves be (optionally) located under Infl, as suggested by Kayne (1987a). If in Infl, $s$ will govern and be governed by personal Agr. If in VP, it will be governed by personal Agr only if it is nondistinct from the V head of VP, as in Kayne's (1977) original analysis of object clitics (as elements adjoined to V). I leave the exact location of $s$ (and object clitics) open here, although, for concreteness, I will assume $s$ to be in Infl. Otero (1986, 87f.) observes that certain uses of Spanish $se$ affect the aspectual content of Infl, a natural effect if $se$ is itself in Infl.
This predicts that nonargument _si_ will only be found in contexts where personal Agr and personal inflection markers are found, namely, _in finite clauses_, in Italian—a desirable result, since we have seen that impersonal _si_ is possible with ergative, psych-movement, copulative, passive, and raising verbs only in finite, not in nonfinite, clauses.

This analysis thus solves problem (II) (that is, why the asymmetry found in nonfinite clauses is absent from finite clauses). Let us consider in more detail how it does so.

In finite contexts [–arg] _si_ is possible (with all verb types) because it can “amalgamate” with personal Agr. [+arg] _si_, on the other hand, is possible only with those verb types that assign an external θ-role. Thus, (1a–g) can all be instances of [–arg] _si_, but only (1a–b) can also be instances of [+arg] _si_. The latter will thus be grammatically ambiguous between the two uses of impersonal _si_. Consider now the nonfinite raising (5) and Aux-to-Comp (6)/(7) environments. Here [–arg] _si_ is uniformly excluded since, as a syntactic person marker, it needs personal Agr and no personal Agr is found in nonfinite clauses in Italian (recall that nonfinite Aux-to-Comp constructions have Agr, but only pleonastic, not personal Agr; see Rizzi (1982a, chap. 4)). Moreover, its feature composition, given in (14b–c), is incompatible with pleonastic pro.

Thus, only [+arg] _si_ is left, which requires association with an external θ-role and nominative Case. Whereas nominative Case is accessible to _si_ in every verbal context of (5) and (6)/(7), an external θ-role is available to _si_ only in transitive and unergative contexts—hence the observed asymmetry.

Finally, consider (2). Here [–arg] _si_ and [+arg] _si_ are both systematically excluded, the former because of the lack of personal Agr in control infinitives in Italian, and the latter because of the systematic lack of nominative Case in the same environment.

2.2. [–Arg] Si in Infinitives: The Case of Portuguese

According to the analysis developed so far, if a language allows for personal Agr in infinitives (and for [–arg] _si_), then it should also allow for impersonal _si_ in infinitives with ergative, psych-movement, copulative, passive, and raising verbs, just as in finite clauses in Italian.

One such language appears to be Portuguese, whose infinitive can be inflected with personal agreement markers according to the paradigm in (15) (see Raposo (1987, 86) and references cited there):

\[
\begin{array}{c|cc}
\text{Singular} & \text{Plural} \\
1 & \text{eu comer} + \emptyset & \text{nós comer} + \text{mos} \\
2 & \text{tu comer} + \text{es} & \text{vós comer} + \text{des} \\
3 & \text{ele comer} + \emptyset & \text{eles comer} + \text{em} \\
\end{array}
\]

‘I/you sing./he/we/you pl./they to eat + agr’

The presence of personal Agr in the infinitive renders both lexical (16a) and null (16b)
subjects possible, as in the corresponding inflected tensed sentences:¹³

(16) a. Será difícil [eles aprovarem a proposta].
   ‘It will be difficult for them to approve-agr(3pl.) the proposal.’
   b. Será difícil [pro aprovarem a proposta].
   ‘It will be difficult pro to approve-agr(3pl.) the proposal.’

The expectation that [−arg] si, interpreted as a syntactic personal agreement marker for the unspecified (generic) person, should be possible in the Portuguese infinitive with personal Agr appears to be confirmed. See (17a–e), which systematically contrast with the impossible Italian examples (5c–g), repeated here as (18a–e):¹⁴

(17) a. Parece ter-se chegado demasiado tarde.
   ‘It seems one to have arrived too late.’
   b. Parece ter-se preocupado apenas um dos pais.
   ‘It seems one to have worried only one parent.’
   c. Parece não se ser benvindo aqui.
   ‘It seems one not to be welcome here.’
   d. Parece não se ter sido convidado por ninguém.
   ‘It seems one not to have been invited by anybody.’
   e. Parece não se resultar ignorar o problema.
   ‘It seems one not to turn out to ignore the problem.’

(18) a. *Sembra essersi arrivati troppo tardi.
   ‘It seems one to have arrived too late.’
   b. *Sembra essersi preoccupato solo un genitore.
   ‘It seems one to have worried only one parent.’
   c. *Sembra non essersi benvenuti qui.
   ‘It seems one not to be welcome here.’
   d. *Sembra non essersi stati invitati da nessuno.
   ‘It seems one not to have been invited by anybody.’

¹³ This is not to say that the two have the same distribution. See Raposo (1987) for discussion and for an account of the difference between tensed and untensed inflected clauses in European Portuguese. The Portuguese examples discussed in this section have been kindly provided (or checked for me) by Manuel Gonçalves Simões, of the University of Venice.

¹⁴ Note that the parallelism between (17) and (18) (and between (5a–b) and (19)-(20)) is not as absolute as it appears. Unlike similar examples in Italian, the Portuguese examples of (17) are not instances of the Raising construction. They are inflected infinitival complements of the verb parecer. Inflected infinitives are, in fact, incompatible with Raising, for principled reasons:

(i) *Os miúdos, parecem [e; trabalharem de tarde].
   the boys seem to work in the afternoon

As pointed out in Mateus et al. (1983, 413), from which (i) is drawn, the chain formed by the two subject NPs in (i) is assigned (nominative) Case twice, once by the embedded Agr and once by the matrix Agr, in violation of the uniqueness requirement on Case assignment to chains (Chomsky (1981, 334)). (i) presumably violates Principle A of the binding theory as well. The embedded subject anaphor is free in its governing category, the embedded IP, which contains a governor and an accessible subject for the anaphor (Agr).

Examples similar to (i) are apparently possible in Brazilian Portuguese. However, see Moreira da Silva (1983, sec. 4.2.1) for discussion and for evidence that they do not involve Raising.
e. "Sembra non risultarsi ignorare il problema.  
   'It seems one not to appear to ignore the problem.'

Note that in transitive and unergative contexts such as (19)–(20) impersonal se can be either [+arg] as in the corresponding Italian sentences (5a–b) or [−arg], with the inflected infinitive, as in (17). The difference is not expressed morphologically, given the zero ending of the 3rd pers. sing. inflected infinitive form.

(19) Parece não se ter ainda descoberto o verdadeiro culpado.  
   'It seems one not to have yet discovered the true culprit.'

(20) Parece não se ter trabalhado bastante.  
   'It seems one not to have worked sufficiently.'

The existence of an infinitive with personal Agr in Portuguese is also responsible for the apparent well-formedness of paradigm (2) in this language, as opposed to Italian. Compare (2) with (21):

(21) a. Seria melhor descobrir-se o culpado.  
   'It would be better one to discover the culprit.'

b. Seria melhor trabalhar-se um pouco mais.  
   'It would be better one to work a bit more.'

c. Seria melhor chegar-se pontualmente.  
   'It would be better one to arrive on time.'

d. Seria melhor não se ter preocupado ninguém.  
   'It would be better one not to have worried anybody.'

e. Seria melhor ser-se ricos.  
   'It would be better one to be rich.'

f. Seria melhor ser-se ajudados por alguém.  
   'It would be better one to be helped by someone.'

g. Seria melhor resultar-se estar em ordem.  
   'It would be better one to appear to be in order.'

(Once again, the Portuguese examples are not the exact analogues of the Italian examples. They are cases not of control but of inflected infinitival extraposed sentences, an option not available to Italian.)

In summary, the postulation of a [−arg] use of the impersonal morpheme (analyzed as a syntactic suppletive form of personal Agr) allows for a straightforward account of various contrasts in impersonal si/se constructions in Italian and Portuguese. It also allows us to dispense with the rather odd assumption that clitic si is affected by NP Movement (see Rizzi (1976), Burzio (1981; 1986)). Rather, si can be assumed to be base-generated (in Infl or VP) like all the other clitics.

Besides these advantages and the motivation it receives from the account of the distribution of si in untensed clauses in Italian, the double analysis of impersonal si is
supported by other evidence. Before we review this in section 2.4, a more detailed discussion of the morphological features attributed to si is in order.

2.3. The Features of Impersonal Si

The unitary characterization of impersonal si given in (14) is repeated here as (22):

(22) Impersonal si
   a. syntactically
      i. ± argument
      ii. clitic pronoun coindexed with [NP,IP] (and, by transitivity, with Agr, when present)
   b. morphologically
      i. person: unspecified (hence, generic or arb)
      ii. number: plural
      iii. gender: masculine\(^{15}\)
   c. semantically
      \([ + \text{ human}]\)

The different setting of the parameter (22ai) gives rise to the following two D-Structure configurations (with si [−arg] there are two possible cases, which depend on whether the V assigns an external θ-role or not). For concreteness, we shall assume si to be in Infl:

(23)

```
      IP
     /   \           
    NP    I'
   /     / \_        
  pro   I  VP
      /   
 (no 𝜙-features) (Agr) si [+ arg]
      \    
       Agr  V
dorme
```

\(^{15}\) The pl., masc., human features are common to all arb elements in Italian. Possibly, then, they should be seen as a function of arb. The number value appears to be the result of a parametric choice, Spanish taking the opposite value (sing.).
In (23) *si* is the *argument*; hence, it will have to be assigned a θ-role at D-Structure. Given its (superscript) coindexation with [NP,IP], which expresses its "subject-oriented" nature, the natural candidate is the external θ-role normally assigned to [NP,IP].

As to the precise mechanism of assignment, we may assume the following. If, as suggested by Belletti and Rizzi (1986, 14), "the external θ-role of the VP is first assigned to Infl under sisterhood, and is then transmitted by Infl to the subject NP under government," then *si* can be taken to "withhold" the external θ-role when this is assigned to Infl, thus preventing it from reaching [NP,IP]. As we shall see in section 4.1, this assumption has some merit over the alternative that takes the external θ-role to be first assigned to [NP,IP] and then transferred to *si*.

The [NP,IP] position in a CHAIN with [+arg] *si* will thus have to contain a non-argument: a pleonastic pro, we have assumed, "identified" at S-Structure by (pleonastic) Agr.\(^\text{16}\) This relation bears some resemblance to the pleonastic-argument CHAIN of sub-

\(^{16}\) In tensed clauses (pleonastic) Agr will be in the Infl containing *si*. In nonfinite Aux-to-Comp clauses it will be in the head C of CP, whereas in Raising environments it will be in the matrix Infl.

If expletives are to be replaced at LF (Chomsky (1986a, 179)), then *si* can perhaps be taken to move to [NP,IP] at that level. Kayne (1987b, fn. 10) presents another case where a clitic should be assumed to replace an expletive at LF (French *il*). Alternatively, this case could be related to the question of expletive replacement in impersonal passives, which lack an appropriate overt NP. I thank Richard Kayne for bringing this question to my attention.
ject "inversion" in Italian (as noted in Burzio (1986, 80, fn. 45 and 173, fn. 57); see also Chomsky (1986b, chap. 3, fn. 120)) but cannot be identified with it entirely (at least considering agreement phenomena; see section 2.4.1).

In (24a–b), on the other hand, pro will be the argument in [NP,IP] and [NP,VP], respectively (θ-marking following its normal course). At S-Structure it will be identified in its ϕ-features by the ϕ-features of Agr augmented by those of si. I will return to the agreement questions directly.

Concerning Case, si is the lexical nominal element in both (23) and (24a–b); therefore, it will have to be part of a chain assigned (nominative) Case at S-Structure. In (23) si is in a CHAIN with the [NP,IP] of its clause. The Case Filter will be satisfied if either (nominative) Case is assigned to that [NP,IP] directly (as in finite and Aux-to-Comp environments) or that [NP,IP] is itself part of a chain assigned (nominative) Case (as in Raising environments).

Note that Case (if not θ) considerations require [+arg] si to be in a CHAIN with [NP,IP]. Otherwise, no Case would be assigned to si in such sentences as (5b) (e, sembra [e, non essersi lavorato a sufficienza] 'It seems si (one) not to have worked sufficiently'), which should thus be on a par with the ungrammatical *Bisogna essersi lavorato a sufficienza 'It is necessary si (one) to have worked sufficiently'. In (24a–b) si, as an [NP,IP] clitic identifying pro in [NP,IP] (in conjunction with personal Agr), is part of a CHAIN with [NP,IP] (and Agr) that is assigned (nominative) Case at S-Structure.17

Consider now the morphological features of si and agreement. Slightly modifying Burzio's (1981; 1986, 59) analysis, we assumed si to have a person feature in addition to number and gender features, just like any other pronominal.18 Unlike the ordinary (1st, 2nd, and 3rd) person features, its unspecified (hence, generic) person feature is nonreferential (in the sense that it is by itself incapable of contributing toward picking a specific referent). Its number and gender features are those characteristic of the class of generic, arb NPs in Italian (see section 3): [+plural] and [+masculine], respectively. This is true (as expected under a unitary analysis of si beyond the differences that follow from the [± argument] distinction of both [+arg] si (see (25a)) and [−arg] si (see (25b)), where agreement is instead with a pro identified by si):

17 If the Case Filter is derived from the θ-Criterion (Chomsky (1981, 336ff.)), [+arg] si will have to be in a CHAIN with [NP,IP] for θ, not just Case, considerations. On the other hand, the obligatory coindexation of [−arg] si with (personal) Agr should follow from its very nature as a syntactic marker of person agreement for the generic person.

18 Unlike Manzini (1983; 1986), I take ( [+arg]) si not to be an R-expression. This appears to be indicated by the well-formedness of (i), even under the interpretation in which the two instances of si refer to the same set of unspecified people:

(i) Quand'anche mi si giurasse essersi fatto di tutto per salvarlo, . . .
   'Even if one swore to me one had done one's best to save him, . . .'

The fact that si is in an A-position is presumably immaterial. Principle C is apparently operative even where the bindee is in an A-position, as shown by (ii), where quel poveraccio, in an A-position, is disjoint from Gianni:

(ii) *Ha detto anche Gianni che quel poveraccio, non lo vogliono.
   'Even Gianni has said that that poor guy, they do not want him.'
(25) a. Quand’anche risultasse non essersi parlato abbastanza di se stessi, ...
   ‘Even if it should turn out that one has not spoken enough of oneself (pl.,
   masc.), ...
   
   b. Si è stati abbandonati a se stessi.
   ‘One has been (pl., masc.) abandoned (pl., masc.) to oneself (pl., masc.).’

Concerning the apparent agreement paradox in such cases as (25b) (where the verb agrees
in 3rd pers. sing. and the past participle in masc. pl.), I follow Burzio (1981, 55; 1986,
59) and Belletti (1982a, fn. 20) (also see Manzini (1986, 242f.)) in regarding it as due to
the fact that the finite verb fails to undergo normal agreement, thus acquiring the default
agreement values (which in Italian are 3rd pers., sing., masc.). The reason why the finite
verb fails to undergo normal agreement resides in the person feature of si and in the fact
that finite verb agreement expresses person and number features syncretically. Since
the verbal inflectional paradigm has no inflectional ending for “unspecified person,” it
will simply not apply, leaving the (plural) number feature unexpressed as well. The
default agreement values will then take over, as noted.19

Past participle agreement is not analogously hampered, since it realizes just the
features of number and gender, which do have a morphological expression ([plural] and
[masculine])—whence the contrast.20

In (25) si cooccurs with what looks like a 3rd pers. pl. reflexive (se stessi) (see (26a)).
This would seem to suggest that si has a 3rd pers. pl. default value, after all. Burzio
(1986, 80f., fn. 46) notes, however, that si is incompatible with other clear 3rd pers. (pl.)
elements such as possessive adjectives (*Si ama i suoi loro eroi ‘Si loves his/their
heroes’), taking this “to support [the] view that si lacks person features, under the
assumption that se stessi (though not suoi loro) is not only third person, but also an
impersonal form” (p. 81).

Slightly modifying Burzio’s basic insight, I have suggested that si has, in fact, un-
specified (generic) person features. Suppose, then, that we consider se stessi (and the
possessive adjective proprio) to be analogously characterized, their unspecified person
feature becoming 3rd pers. by default. Then their compatibility with 3rd pers. referential
and nonreferential NPs ((26)–(27)) and their incompatibility with 1st and 2nd pers. ((28)–
(29)) follows:21

---

19 Burzio (1981; 1986) and Belletti (1982a) differ minimally in this respect. The former assumes that si
lacks person features altogether, the latter that it has an unspecified person feature. The position taken in the
text is closer to Belletti’s.

20 Following Kayne (1985), I take the past participle to agree with its subject, as indicated in (i) (an S-
Structure representation):

   (i)  pro; Agr \( \sim \) si \( \sim \) [t; stati [t; abbandonati t; a se stessi]]

21 The fact that in the passive usage of si, to be examined in section 4, si is compatible with 3rd pers.
subjects only, even though number agreement with the verb is given by the NP in [NP,IP] (I Rossi si sono
invitati più volte ‘The Rossis si were invited several times’ versus *Noi/voi si siamo/sietetsono invitati più
volte ‘We/you si were invited several times’) may again be a consequence both of the default procedure that
turns unspecified into 3rd pers. and of the fact that si must be compatible with the features of Agr.
(26) a. Loro non comprendono nemmeno se stessi.
   ‘They (3rd pers. ref.) do not even understand themselves.’
   b. Loro non comprendono nemmeno il proprio ruolo.
   ‘They (3rd pers. ref.) do not even understand their own role.’

(27) a. Quando non si comprende nemmeno se stessi, . . .
   ‘When one does not even understand oneself, . . .’
   b. Quando non si comprende nemmeno il proprio ruolo, . . .
   ‘When one does not even understand one’s own role, . . .’

(28) a. *Noi non comprendiamo nemmeno se stessi.
   ‘We do not even understand ourselves/oneself.’
   b. *Noi non comprendiamo nemmeno il proprio ruolo.
   ‘We do not even understand their/one’s own role.’

(29) a. *Voi non comprendete nemmeno se stessi.
   ‘You do not even understand themselves/oneself.’
   b. *Voi non comprendete nemmeno il proprio ruolo.
   ‘You do not even understand their/one’s own role.’

2.4. Three Further Consequences of the Double Analysis of Si

2.4.1. A Past Participle Agreement Paradox. Burzio (1981, 82ff., fn. 5) notes the existence of agreement contrasts such as the following:

(30) Alla fine, si è risultati/*risultato non aver dormito abbastanza.
   ‘In the end, *si is appeared(pl., masc.)/(sing., masc.) not to have slept enough
   (‘. . . one/we appeared not to have slept enough’).’
(31) Alla fine, è ?risultato/*risultati non essersi dormito abbastanza.
   ‘In the end, it appeared(sing., masc.)/(pl., masc.) *si not to have slept enough
   (‘. . . it appeared one had not slept enough’).’

In his analysis, which assumes *si to be base-generated in NP positions, the different collocation of *si is a consequence of the order of application of Si Cliticization and Raising. In (30) Si Cliticization applies after Raising has moved *si to the matrix [NP,IP] position. In (31) it applies before Raising, which then moves the trace of *si to [NP,IP] of the matrix clause, where it is properly governed by a nonargument pronominal Infl (Burzio (1986, 93)). As Burzio notes (1981, 83), the contrast in past participle agreement displayed by (30)–(31) appears particularly puzzling given that the trace of *si triggers [plural, masculine] past participle agreement in other environments, such as (32):

(32) Si, dovrebbe e, essere e, risultati e, aver mangiato bene.
   ‘Si (one) should have appeared(pl., masc.) to have eaten well.’

Within the analysis sketched in section 2.2, (30)–(31) have two quite distinct derivations. In both cases *si is base-generated in Infl (in the matrix Infl and the embedded Infl, respectively). In (30) *si must be the [−arg], affix-like *si, for no θ-role is assigned to the
matrix [NP,IP] at D-Structure. At D-Structure the argument is instead in the embedded subject position: a pro with the features [unspecified person, plural, masculine]. From D- to S-Structure pro is raised to the subject position of the past participle phrase, from which position it triggers agreement (Kayne (1985)), and then to the matrix subject position:

\[(33)\] \[\text{pro}^g \text{ si è [e, risultati [e, non aver dormito abbastanza]]}\]

The agreement facts here are entirely parallel to those of the simpler case discussed above (\textit{si è stati abbandonati}; see fn. 20).

Consider instead (31). Here \textit{si} must be [+arg] \textit{si}, in a CHAIN with pleonastic pro, since [−arg] \textit{si} is incompatible with the nonpersonal Agr of infinitivals. What is raised to the subject position of the past participle phrase, and then to the matrix [NP,IP] position, is pleonastic pro.

It seems plausible to assume that, by itself, pleonastic pro has no person, number, and gender features, thus triggering default agreement in tensed inflection (3rd pers., sing.) and past participles (sing., masc.). Consider (34), which contains an instance of NP Movement of pleonastic pro in a raising environment:

\[(34)\] \[\text{pro}_i \text{ è [e, risultato [e] evidente [\text{che mentivano}]]}\].

\textit{‘It turned out (as) obvious that they were lying.’}

This, however, is not always the case. In sentences such as (35),

\[(35)\] \[\text{pro}_i \text{ sono [e, risultati [e, esserne arrivati [anche troppi]]]}\].

\textit{‘It have (lit. are) turned(pl., masc.) out to have arrived(pl., masc.) even too many(pl., masc.).’}

which are standardly analyzed as containing a pleonastic pro undergoing NP Movement (compare, mutatis mutandis, Chomsky (1981, 266)), a nondefault agreement appears on the inflected verb and the past participles.

What differentiates (34) from (35) is that in the latter pro is part of a CHAIN containing a nominal element with person, number, and gender features (the element that apparently controls agreement “at a distance”). Given that in (31) pleonastic pro is also in a CHAIN with a nominal element with person, number (pl.), and gender (masc.) features, why is it the case that no [pl., masc.] agreement is found on the (matrix) past participle?

A difference between (31) and (35) is that the nominal element (potentially) controlling agreement in the CHAIN is in an A-position in (35) and in an \(\overline{A}\)-position in (31).\(^{22}\) Suppose we assume (36) (see Roberts (1985, 490) for a proposal very close in spirit to this one):

\(^{22}\) This implies that the postverbal subject position of transitives and unergatives (which is apparently able to transmit its features to the head of the CHAIN) is an A-position—a possibility suggested on independent grounds by Koopman and Sportiche (1985), Belletti (1986), and Pollock (1986), among others.
(36) Only nominal elements that are in A-positions in a CHAIN can transfer their features to the head of the CHAIN.

If so, the agreement puzzle of (30)–(31) disappears, for in (31) *sì will be unable to transfer its features to pleonastic pro, which will then trigger the default (3rd pers. sing.) agreement with the finite verb. \(^{23}\)

Indirect evidence for this failure of feature transfer in (31) (hence for (36)) comes from the inability of pro to bind the generic reflexive *se stessi* (which presumably requires the features of *sì*):

(37) *Risultava anche a se stessi non essersi dormito abbastanza.
    ‘It appeared even to oneself one not to have slept enough.’

(37) contrasts with (38),

(38) ?Risultava essersi parlato solo di se stessi.
    ‘It appeared one to have spoken only about oneself.’

where *sì* itself presumably acts as the antecedent of *se stessi* given that it c-commands *se stessi.*

2.4.2. *Si and the Reciprocal Form* L’uno . . . l’altro. Although it can occur with the generic reflexive form *se stessi* (as in (38)), [+arg] *sì is apparently incompatible with the reciprocal form l’uno . . . l’altro (gli uni . . . gli altri) (see Belletti (1982b) for a detailed study of this construction). Consider the contrast between (39) and (40):

(39) Si era parlato l’uno con l’altro.
    ‘Si had spoken with each other.’

(40) a. (Io non c’ero, ma) *deve/sembra essersi parlato l’uno con l’altro.
    ‘(I wasn’t there, but) it must/seems *sì to have spoken with each other.’

    ‘I deemed *sì to have spoken with each other.’

c. *Non essendosi affatto parlato l’uno con l’altro.
    ‘*Sì not having at all spoken with each other.’

Given that (40) can only be an instance of [+arg] *sì, for familiar reasons, whereas (39) can be an instance of either [+arg] or [−arg] *sì, I interpret the contrast as indicating that only [−arg] *sì is compatible with the reciprocal form (this is confirmed by the well-formedness of l’uno . . . l’altro in sentences where only [−arg] *sì is available: *Si è stati presentati l’uno all’altro ‘One/we have been introduced to each other’). But why should l’uno . . . l’altro be compatible with [−arg], but not with [+arg], *sì?*

\(^{23}\) Burzio’s (1981) analysis could possibly derive the same results if it incorporated something like (36) and if the trace of *sì*-cliticization were differentiated from that of *sì*-raising. In chapter 1, footnote 5, Burzio in fact discusses the possibility of accounting for the contrast in (30)–(31) by assuming insertion of a pleonastic element in the position vacated by *sì;* but he then dismisses it on the basis of other considerations (which are not relevant in the present context).
I would like to suggest that this is again a consequence of the different analysis attributed above to the two si’s in interaction with one aspect of the grammar of the reciprocal form.

Belletti (1982b, sec. 2) presents some evidence that the element l’uno must move in LF and adjoin to a c-commanding plural NP in A-position. If this is so, it becomes understandable why the form l’uno . . . l’altro is compatible with [−arg], but not with [+arg], si. Only in the former case is there a plural NP in A-position to which l’uno may adjoin: the argument generic, pl., masc. pro in [NP,IP]. In the latter case [NP,IP] is filled by a pure pleonastic pro to which, as we have seen, si is unable to transfer its features (we are also assuming that l’uno cannot adjoin directly to si, a clitic in Â-position).

2.4.3. Si and the ‘‘Floated’’ Quantifier Tutti. [−arg] and [+arg] si also differ with respect to the possibility of cooccurring with the “floated” quantifier tutti. See the contrast between (41) and (42):

(41) a. Si è stati invitati tutti.
   ‘Si has been invited all (‘‘we were all invited’’).’
   b. Si è reagito a sproposito tutti.
   ‘Si has reacted off the point all (‘‘we all reacted off the point’’).’
(42) a. *?Sembra essersi reagito a sproposito tutti.
   ‘It seems si to have reacted off the point all.’
   b. *?Ritiene essersi reagito a sproposito tutti.
   ‘He believes si to have reacted off the point all.’
   c. *?Essendosi reagito a sproposito tutti, . . .
   ‘Having si reacted off the point all, . . .’

As in the case of l’uno . . . l’altro, which it closely resembles, the contrast at hand can apparently again be made to follow from the double analysis of si, in interaction with the analysis of “floated” quantifiers, under any of the various alternatives proposed. The classical analysis (see Baltin (1982) for one recent formulation) takes the quantifier to move rightward from a plural (subject) NP. Kayne (1981), Belletti (1982b), Koopman and Sportiche (1985), and Bayer (1987), among others, argue instead for a “base-generation” analysis of the quantifier, within somewhat different sets of assumptions.

What all of these analyses share is the idea that the “floated” quantifier must be construed with a plural NP antecedent in A-position. If this is so, the impossibility of tutti with [+arg] si can again be related to the fact that the only NP antecedent in A-position with which tutti could be construed is pleonastic pro in a CHAIN with si, and this lacks the required plural features.

To summarize, we have seen evidence to distinguish between a [+arg] and a [−arg] use of si. Such evidence was based (a) on various aspects of the distribution of si in untensed clauses in Italian (sections 2.1 and 2.4) and (b) on certain systematic contrasts between Italian and Portuguese (section 2.2). In section 3 we will see that the asymmetry
noted in section 1 between transitive and unergative verbs, on the one hand, and the remaining verb classes, on the other, arises in a quite different domain, having to do with the interpretation of *si*.

3. *si* in Finite Clauses with Specific Time Reference

Although *si* receives a generic (arbitrary) interpretation (roughly paraphrasable as ‘people, one’) in generic sentences, in sentences with specific time reference *si* retains a generic/arbitrary reading only when it occurs with transitive and unergative verbs. With the other verb classes it acquires a new interpretation, roughly paraphrasable as ‘a specified set of people including the speaker’ (‘we’). The difference is subtle—but real. I think—and it becomes clearer when a predicate can be selected that is pragmatically incompatible with the inclusion of the speaker (as is the case in (43c,f)):

(43) a. (Trans) 
   *Oggi, a Beirut, *si* è ucciso un innocente.
   ‘Today, in Beirut, one killed an innocent.’

b. (Unerg) 
   *Oggi, a Beirut, *si* è sparato tutta la mattina.
   ‘Today, in Beirut, one shot the whole morning.’

c. (Erg) 
   %*Oggi, a Beirut, *si* è nati senza assistenza medica.
   ‘Today, in Beirut, we were born with no medical assistance.

d. (Psych) 
   %*Oggi, a Beirut, *si* è preoccupato il contingente dell’ONU.
   ‘Today, in Beirut, we have been worrying the UN contingent.

e. (Cop) 
   %*Oggi, a Beirut, *si* è sfiniti dalla fame.
   ‘Today, in Beirut, we are worn out with hunger.’

f. (Pass) 
   %*Oggi, a Beirut, *si* è stati uccisi inutilmente.
   ‘Today, in Beirut, we have been killed in vain.’

g. (Rais) 
   %*Oggi, a Beirut, *si* è risultati non aver rispettato le convenzioni internazionali.
   ‘Today, in Beirut, we turned out not to have complied with international conventions.’

We will see that such semantic/pragmatic asymmetry, which exactly matches the syntactic asymmetry, is related to the same double analysis of impersonal *si*, although it is strictly speaking, an effect of a more general theory of ‘*arb*(bitrary interpretation).’

3.1. Arbitrary 3rd Person Plural Pronouns and the Theory of Arb

The fact that in contexts of specific time reference a pure impersonal reading of *si* is available just with transitive and unergative verbs recalls the similar observation made by Benincà (1983, fn. 6) and by Belletti and Rizzi (1986, sec. 1.2) (also see Jaeggli (1986) concerning the impersonal interpretation of 3rd pers. pl. pronouns in specific context. There, an impersonal reading of 3rd pers. pl. pronouns is open only to subjects of tra
sitive and unergative verbs (where a θ-role is assigned externally). For example:

(44) a. (Trans)  Lo hanno cercato: era un signore anziano.
   ‘They have been looking for him: it was an elderly man.’

b. (Unerg)  Prima, hanno telefonato: mi pareva tua sorella.
   ‘Earlier, they telephoned: it seemed to me it was your sister.’

c. (Erg)  *Sono venuti a vedere: era una signora anziana.
   ‘They came to see: it was an elderly lady.’

d. (Psych)  *Hanno colpito il giornalista per l’estrema gentilezza: era il tuo amico.
   ‘They impressed the journalist with their extreme kindness: it was your friend.’

e. (Cop)  *Ieri, sono stati villani con tutti: era tuo fratello.
   ‘Yesterday they were rude to all: it was your brother.’

f. (Pass)  *Sono stati catturati: era un ragazzo.
   ‘They have been arrested: it was a boy.’

g. (Rais)  *Gli sono sembrati (essere) in difficoltà: doveva essere Carlo.
   ‘They appeared to him (to be) in difficulty: it must have been Carlo.’

The resemblance is not complete, however. Besides the difference noted by Jaeggl (1986b, 54f.) and Belletti and Rizzi (1986, fn. 7), the parallelism breaks down in at least one other context. Whereas the pure impersonal interpretation is restored, in the si construction, if the ergative, psych-movement, copulative, passive, or raising verb is embedded in a context that suspends the specificity of the time reference, this is not true for the 3rd pers. pl. construction:

24 Under this kind of interpretation of 3rd pers. pl. pronouns, there is no commitment to semantic plurality. As the continuation of each sentence shows, the impersonal interpretation is compatible with there being a single individual satisfying the description (see Benincà (1983), Belletti and Rizzi (1986)). (44a–c,f) are from Benincà (1983, 61); (44d) is adapted from Belletti and Rizzi (1986, sec. 1.2).

Benincà (1983) and Jaeggl (1986b, 50) note that no impersonal interpretation is available in middles either. Contrary to Jaeggl (1986b, 52), and in accord with Belletti and Rizzi (1986, sec. 1.2), I find an impersonal interpretation of a 3rd pers. pl. subject impossible with raising (in specific contexts); see (44g). It is interesting that all of Jaeggl’s examples with raising are generic rather than specific in time reference. These, as I will argue, are characterized by a different interpretation of arb, compatible with derived subjects. I find an impersonal interpretation equally impossible with inherent and true reflexives. For example:

(i) a. *Ho saputo che si sono ammalati. Pare sia suo fratello.
   ‘I learned that they got ill. It seems it is his brother.’

b. *Si sono comprati i giudici. Pare sia stato l’avvocato.
   ‘They bought the judges for themselves. It seems it was the lawyer.’

See, in particular, the minimal contrast between the latter and (ii):

(ii) Hanno comprato i giudici. Pare sia stato l’avvocato.
   ‘They bought the judges. It seems it was the lawyer.’

25 Belletti and Rizzi (1986) and Jaeggl (1986b, 54) point out that the impersonal interpretation of si (our [–arg] si), as well as that of PRO and object pro, may include the speaker, whereas impersonal 3rd pers. pl. pronouns exclude this possibility.
(45) a. (Erg) Mi domando se a Beirut, si sia nati senza assistenza medica anche oggi.
   ‘I wonder whether in Beirut one was born with no medical assistance today still.’

b. (Psych) Se si è preoccupato il contingente dell’ONU (si è certamente fatto qualcosa di irregolare).
   ‘When si has worried the UN contingent (certainly something irregular was done).’

c. (Cop) Quando si è sfiniti dalla fame (non si ragiona).
   ‘When si is worn out by hunger (one cannot reason properly).’

d. (Pass) Una volta che si è stati uccisi cosa importa aver avuto ragione?
   ‘Once si has been killed it doesn’t matter to have been right.’

e. (Rais) Quando si è risultati non aver rispettato le convenzioni internazionali (si è automaticamente dalla parte del torto).
   ‘When si has turned out not to have respected international conventions (si is automatically in the wrong).’

(46) a. (Erg) *Se sono venuti (era un signore anziano), un motivo ci sarà.
   ‘If they came (it was an elderly man), there is a reason.’

b. (Psych) *Anche se hanno colpito il giornalista per l’estrema gentilezza
   (so che era il Presidente), non conta.
   ‘Even if they impressed the journalist with their extreme kindness (I know it was the President), it doesn’t matter.’

c. (Cop) *??Se sono stati villani al telefono (era mio fratello), un motivo ci
   sarà stato.
   ‘If they have been rude on the phone (it was my brother), there must be a reason.’

d. (Pass) *Se sono stati arrestati (era un povero ragazzo), avranno potuto
   avere un avvocato, spero.
   ‘If they have been arrested (it was a poor boy), they will have been able to have a lawyer, I hope.’

e. (Rais) *Se sono sembrati (essere) in difficoltà (era il tuo amico), non
   è certo per colpa nostra.
   ‘If they have turned out (to be) in difficulties (it was your friend), surely it was not our fault.’

Despite these differences, the parallelism is sufficiently strong to suggest the presence, at some level, of a common property underlying the two arb constructions.²⁶

²⁶ Another difference between the two constructions, for which I have no adequate explanation, is that in the presence of a (tonic) reflexive pronoun an impersonal interpretation is lost in the 3rd pers. pl. construction, though it is still possible in the si construction:

(i) *Qui hanno favorito se stessi. E’stato sicuramente Carlo.
   ‘Here they have favored themselves. It was surely Carlo.’

(ii) ?Qui, si è favorito se stessi.
     ‘Here si has favored themselves.’
Some light is shed on this question by the observation that the 3rd pers. pl. construction enters a second *arb* usage. Belletti and Rizzi (1986, fn. 6) mention the existence of another interpretation of 3rd pers. pl. pronouns, in generic contexts, that is close to universal quantification, the first interpretation being close to existential quantification (for example, *Qui hanno sempre rispettato gli americani* ‘Here they have always respected the Americans’).

Starting from this observation, I would like to claim that these two usages, which differ systematically in a number of ways and which we may call, for convenience, the *quasi-existential* and *quasi-universal* usages, are just two *contextual variants* of one and the same *arb* (indeed, to be found throughout the class of *arb* constructions).27

One important difference between the two usages is that the quasi-universal usage is apparently not constrained by θ-requirements; that is, the quasi-universal interpretation of 3rd pers. pl. pronouns is also possible with verbs that do not assign an external θ-role:28

(47) a. (Trans) Li, odiano gli stranieri.
‘There they hate foreigners.’

b. (Unerg) Qui, lavorano anche di sabato.
‘Here they work even on Saturday.’

c. (Erg) Qui, vanno a scuola già a quattro anni.
‘Here they go to school when they are four years old.’

d. (Psych) (??)Qui, attirano i turisti anche senza volere.
‘Here they attract tourists even without wanting to.’

e. (Cop) In questo ufficio, sono molto gentili col pubblico.
‘In this office, they are very kind to the public.’

f. (Pass) Qui, sono educati un’atmosfera protestante molto rigida.
‘Here they are raised in a very strict Protestant atmosphere.’

g. (Rais) Qui, sembrano ben disposti verso gli stranieri.
‘Here they seem to be favorably disposed towards foreigners.’

27 The unified approach to *arb* suggested here is reminiscent of Carlson’s (1977) unified approach to (English) bare plurals, which also admit of a “quasi-universal” (*Dogs run around in circles*) and a “quasi-existential” (*Dogs are running around in circles*) interpretation. Like Carlson, I want to suggest that the two interpretations depend on the particular tense and aspect of the sentence (see footnote 29 and corresponding text).

28 Quoting the following examples, Belletti and Rizzi (1986, fn. 6) claim that some contrast (albeit weaker than that present in the other usage) is still detectable in generic contexts:

(i) Qui, hanno sempre rispettato gli americani.
‘Here (people) always respected Americans.’

(ii) a. ?Qui, sono sempre stati rispettati dagli americani.
‘Here (people) were always respected by Americans.’

b. ??Qui mi sono sempre sembrati filoamericani.
‘Here (people) always to me seemed friendly to Americans.’

It seems, however, that these cases imply some kind of repetition of a specific time reference. If a pure generic time reference is used, as in (47), all contrast disappears.
h. (Refl) Qui, si fanno in quattro per aiutare.
   ‘Here they do their utmost to help.’

Here, unlike what happens with the quasi-existential interpretation, any continuation that implies the existence of a single individual satisfying the description gives rise to an ill-formed discourse (for example, (*)Qui, sono gentili col pubblico: è quell’impiegato li ‘Here, they are kind with people: it is the clerk over there’). Also, the quasi-universal reading is lost if the time reference of the verb becomes specific (Sono (appena) andati a scuola in bicicletta ‘They have (just) gone to school by bike’) but is restored if the sentence is embedded in a context that suspends such specificity (Se qui sono andati a scuola in bicicletta, si ricorderanno come si fa ‘If they have gone to school by bike, they will remember how to do it’). These options are unavailable to the quasi-existential reading, as noted above.

The different properties of the two usages can be summarized as follows:

(48) Quasi-existential Interpretation
     a. Compatible with specific time reference (44a–b)
     b. Incompatible with generic time reference (47)
     c. Incompatible with contexts suspending the specificity of the time reference
     d. Compatible with the existence of a single individual satisfying the description
     e. Restricted to [NP,IP] θ-marked in D-Structure

(48a–c/a’–c’) can in fact be seen as distinct effects of the same property. The key to an understanding of the two different arb interpretations and of their different clusters of properties appears to be the different semantics of the generic and specific time reference.

As noted in the literature, in generic sentences an indeterminate subject is understood as (roughly) equivalent to a universal, not an existential, quantifier.29 (A rhinoceros

29 In generic sentences, as opposed to specific time reference sentences, the tense operator is roughly equivalent (if anything) to a universal quantifier (over times). As observed in Lawler (1973), for example, a generic sentence such as (i)

   (i) Here a child goes to school by car.

is false not only if the property is satisfied by only one child, but also if (most) children go to school by car one day out of six, thus suggesting a logical structure roughly equivalent to ‘For all (most) occasions . . . ’. For a general discussion of generic sentences, see Lawler (1973), Dahl (1975), and Nunberg and Pan (1975).

As Luigi Rizzi (personal communication) points out, the “quasi-universal” and “quasi-existential” interpretations of arb recall Irene Heim’s notion of unselective binding: the zero subject of (47) looks like a variable unselectively bound by the universal or existential tense operator, respectively.
eats small snakes is thus roughly equivalent to 'For every x, x a rhinoceros, x (characteristically) eats small snakes'. In sentences with specific time reference, instead, an indeterminate subject cannot be so interpreted (thus, A rhinoceros is eating small snakes is not equivalent to 'For every x, x a rhinoceros, x is eating small snakes'). The interpretation is rather that of an existential quantifier ('There is an x, x a rhinoceros, such that x is eating small snakes').

In this light, it seems plausible to assume that arb (or impersonal) indeterminate subjects acquire the two different interpretations of quasi-universal and quasi-existential quantification as a function of the different time reference (generic and specific, respectively) of the tense/aspect of their sentence (see the end of fn. 29). In other words, they can be seen as two contextual variants of a single arb entity.

Under this assumption, the first four properties of the two interpretations of arb follow as simple consequences of this primitive difference. What about (48e) and (48e')? Why should the quasi-existential interpretation, as opposed to the quasi-universal one, be restricted to D-Structure subjects?

Jackendoff (1972, 310) notes that the interpretation of generics must be taken to apply at S-Structure. According to him, the S-Structure subject orientation of generics becomes apparent if we convert a generic sentence such as the one given above into a passive:

(49) Small snakes are eaten by a rhinoceros.

In this sentence ‘the by-phrase [is] not generic in the same sense as [its] counterpart . . . ; the surface subject is the thing whose properties are being described. We conclude that genericity is determined at surface structure’ [my emphasis].

If so, it is not surprising that a quasi-universal interpretation is available to surface arb subjects, which are not θ-marked in [NP,IP] at D-Structure.

Concerning (48e), we will assume instead (and without much motivation) that the quasi-existential interpretation of arb needs to be matched with Infl at D-Structure (perhaps in the form of absorption of certain features by Infl; see Otero (1986)). Given such an assumption, the availability of this kind of interpretation with transitive and unergative subjects only follows directly.

Although many aspects of this conception of arb may be wrong (I hope not the conception itself), this level of probing is sufficient, it seems, to draw the correct empirical consequences for the arbitrary 3rd pers. pl. construction, as we have seen, as well as for the other arb constructions that we will briefly review in the following sections.

3.2. The Arbitrary 2nd Person Singular Pronoun Construction

A prediction of the (rough) analysis of arb sketched in the previous section is that any other arb construction that does not restrict arb interpretation to [NP,IP] θ-marked in D-Structure will necessarily display the rest of the properties of the right column of (48), not those of the left column. This appears confirmed by the arb use of 2nd pers. sing.
pronouns, which can be used impersonally with all types of verbs. For example:

(50) a. Li lavori poco e sei pagato bene.
‘There you work little and you are paid well.’
b. Se nasci ricco, hai qualche vantaggio in più.
‘If you are born rich, you have an additional advantage.’

As expected under the present analysis, the interpretation is necessarily that of a quasi-universal quantification (‘For all x’s, there, x works little and is paid well . . .’) not that of a quasi-existential one (*‘There is an x such that, if x works little . . .’). Second, this arb interpretation is incompatible with specific time reference (48a’). (51) has only a personal interpretation:

(51) Li hai lavorato poco e sei stato pagato bene.
‘There you worked little and you were paid well.’

The pure arb interpretation is restored, however, when (51) is embedded in a context that suspends the specificity of the time reference (48c’):

(52) Quando hai lavorato poco e sei stato pagato bene, . . .
‘When you worked little and you were paid well, . . .’

The existence of a single individual satisfying the description (as in (48d’)) leads to unacceptability:

(53) *Qui sei sempre a tuo agio: mi pare Giorgio.
‘Here you are always at your ease: it looks to me it is Giorgio.’

Finally, it can be used in sentences with generic time reference:30

(54) Qui puoi anche morire per strada e nessuno ti aiuta.
‘Here you can also die in the street and nobody helps you.’

3.3. Arb in Non-[NP,IP] Positions

Another consequence of the above analysis of arb is that non-[NP,IP] positions interpreted impersonally (if any) should only allow for the quasi-universal interpretation, not the quasi-existential one. The reason for this is that the quasi-existential interpretation requires arb to be in (a CHAIN with) [NP,IP] (and Infl) at D-Structure, as noted (possibly to allow Infl to absorb some of the NP’s features). And arb elements in non-[NP,IP] positions clearly do not satisfy the requirement.

This prediction appears to be confirmed. In fact, 2nd pers. sing. pronouns do permit an impersonal interpretation in non-[NP,IP] positions, and this is only quasi-universal. See (54) and (55):

---

30 I am not implying here that 3rd pers. pl. pronouns and 2nd pers. sing. pronouns with “quasi-universal” arb interpretation are completely identical in interpretation and function or that they should be freely interchangeable in the same contexts.
(55) Pretendono sempre tutto da te e non ti danno niente.
‘They always pretend everything from you and give you nothing.’

Consider now 3rd pers. pl. pronouns. Jaeggli (1986b, 48) notes that one such pronoun “in object position associated with a clitic pronoun on the verb is always interpreted as definite in reference,” and “the same is true of a pro subject of a small clause associated with a clitic on the governing verb.” Clearly, such a pronoun cannot have a quasi-existential interpretation (as we indeed expect):

(56) a. *Li ho visti per strada: era Giovanni, credo.
    ‘I have seen them in the street: I think it was Giovanni.’

    b. *Li considerai interessanti: era un vecchio professore.
    ‘I considered them interesting: it was an elderly professor.’

(56a–b) cannot mean ‘I have seen someone in the street: it was Giovanni’, ‘I considered someone interesting: it was an elderly professor’.

However, nothing in the analysis of arb sketched here would seem to prevent an object 3rd pers. pl. pro from being used impersonally in the quasi-universal interpretation (though nothing of course forces its existence either).

As a matter of empirical fact, this use is attested, unexpectedly under the analysis of Jaeggli (1986b) but not under the above analysis of arb:31

(57) a. In questo ufficio, non li smuovi neanche col fucile.
    ‘In this office, you don’t move them even with a rifle.’

    b. In questo ufficio, tendono a pensarle che li si consideri degli sfaticati.
    ‘In this office, they tend to think that you consider them idlers.’

Another interesting piece of evidence is provided by the null object with arb interpretation studied in detail by Rizzi (1986):

(58) a. Il bel tempo invoglia pro a restare.
    ‘The nice weather induces to stay.’

    b. Un generale può costringere pro a obbedire ai suoi ordini.
    ‘A general can force to obey his orders.’

This instance of arb pro has only the quasi-universal interpretation, as we expect. Rizzi in fact notes (p. 504) that it cannot occur in specific time contexts, because a quasi-universal interpretation normally requires generic time reference:

(59) *Alle 5, il generale ha costretto pro a obbedire ai suoi ordini.
    ‘At 5, the general has forced to obey his orders.’

The further question, however, is this: Why can’t this instance ofarb be used in specific time contexts such as (59) in its quasi-existential interpretation (‘. . . has forced someone

31 Incidentally, this impersonal use of an object clitic renders the approach pursued in Jaeggli (1986b) problematic.
which was seen above to be compatible with such contexts? The possibility is excluded if, as suggested, the quasi-existential interpretation of an NP requires it to be in (a CHAIN with) [NP,IP] (and Infl) at D-Structure.

The lack of the quasi-existential reading for arb object pro (whence the lack of any interpretation for (59)) is, on this view, not at all accidental.

3.4. The 1st Person Plural Interpretation of Si

Let us return to our original problem. Why is it the case that impersonal si loses its pure arb interpretation and acquires a 1st pers. pl. interpretation in specific contexts with ergative, psych-movement, copulative, passive, and raising verbs?

The theory of arb sketched in section 3.1 answers part of the question. Under the assumption that si is an impersonal, arb element, it is to be expected that no arb interpretation will be available to si in specific time contexts with such verbs, just as it was not with 3rd pers. pl. pronouns. We know that the quasi-universal use of arb is incompatible with specific time reference and that its quasi-existential use is restricted to the [NP,IP] position of transitive and unergative verbs only—hence the lack of a pure arb interpretation for (43c–g). This theory of arb, however, does not yet provide a clue to why in the context (43c–g) we find what we may describe as roughly a 1st pers. pl. interpretation—that is, one that denotes a plural set including, or involving, the speaker.

I tentatively interpret this as a strategy to reconcile the requirement that specific sentences have a referential subject with the requirement imposed by the impersonal, arb, meaning of si. In a sense, 1st pers. pl. pro represents the best approximation of a specific, referential pronoun to an arb pronoun. This appears to be due to the fact, as Paola Benincà (personal communication) points out, that we is the only combination of person and number features that may encompass all the other feature combinations. In its inclusive reading, we may comprise 1st, 2nd, and 3rd persons, whereas all the others exclude some. In other words, it is the most general (and generic) of all personal referential pronouns.

Apart from this intuitive interpretation, there is some independent evidence that si in these contexts identifies a 1st pers. pl. pro in [NP,IP]:

(I) It is incompatible with morphologically 3rd pers. arb elements like se stess- and propri- (see the text before (26)): 32

(60) a. *?Amici! Un minuto fa, si è stati abbandonati a se stessi.
   ‘My friends! One minute ago si was (‘we were’) abandoned to oneself.’
   b. *?Non ricordate? Quel giorno si fu consegnati ai propri nemici.
   ‘Don’t you remember? That day si was handed to one’s enemies.’

(II) It may cooccur with 1st pers. pl. emphatic pronouns (see Burzio (1986, 109–115)):

32 Instead, noi stessi ‘ourselves’ and nostri ‘our’ must be used.
(61) Si è stati invitati anche noi.
    ‘Si was invited we too.’

(III) It may “resume” a (left-dislocated or relativized) 1st pers. pl. pronoun ((62b)
is from Burzio (1981, 146)):

(62) a. Noi, ha detto che non si è stati invitati.
    ‘We, he said that si wasn’t invited.’

    b. Proprio noi, che tutti ammettevano la possibilità che si sarebbe vinto le
        Olimpiadi senza difficoltà, . . .
    ‘Just us, who everybody admitted the possibility that si would have won
        at the Olympic games with no difficulty, . . .’

(IV) It may control a PRO with 1st pers. pl. features (as evidenced by the embedded
reflexive clitic) ((63) is from Skytte (1983, 88)):

(63) Non si poteva ubriacarci ogni mattina.
    ‘Si could not get ourselves drunk every morning.’

(V) It gives rise to disjoint reference effects with 1st pers. pronouns (see Stefanini
(1982, fn. 15) for a similar observation concerning Fiorentino):

(64) a. *Ieri sera, mi/ci si è stati presentati troppo in fretta.
    ‘Last night, si was introduced to me/to us too much in a hurry.’

    b. *Li, non mi/ci si è stati simpatici.
    ‘There si wasn’t agreeable to me/to us.’

The ungrammaticality of (64) and the like follows from the Unlike Person Constraint of
Postal (1966) subsumed under (certain versions of) Principle B of the binding theory, if,
crucially, si identifies a 1st pers. pl. pro in [NP,IP] (compare *Noi mi siamo stati pre-
sentati troppo in fretta ‘We have been introduced to me too much in a hurry’, *Noi non
mi siamo stati simpatici ‘We haven’t been agreeable with me’).

(64) contrasts sharply with (65),\(^{33}\)

(65) Mi si è scritto per dirmi di venire.
    ‘Si has written to me to tell me to come.’

where si can be interpreted as an instance of the quasi-existential quantification reading,
because it is found in an unergative context. Thus, no 1st pers. pl. interpretation is forced
and no disjoint reference effect ensues.\(^{34}\)

\(^{33}\) 1st pers. pl. (indirect) object clitics are slightly marginal:

(i) ?Ci si è scritto per dirci di venire.
    ‘To-us si has written to tell us to come.’

This is possibly related to the interfering fact that ci is also used as the reflexive form of si.

\(^{34}\) In certain Tuscan dialects, most typically Fiorentino, si has virtually replaced the ordinary 1st pers. pl.
ending of the verb (*andiamo → si va) (see Rohlfs (1968, 234, 252), Stefanini (1982, 98f. and fns. 11–13)). Also
see Lepschy and Lepschy (1977, 217–219).
If we take the pure \( arb = 1st \text{ pers. pl.} \) semantic switch in these contexts to have no effect on the morphological features of \( si \), verbal agreement will follow the standard default procedure (whence the 3rd pers. sing. inflection on the verb). Past participle agreement, which is induced by 1st pers. pl. pro, will be masculine or feminine (according to the gender of pro) (see Lepschy and Lepschy (1977, 218)).

3.5. French On

Essentially the same account extends to the French impersonal (phonological) subject clitic \( on \). Like \( si \), and for the same reasons as \( si \), \( on \) necessarily takes a 1st pers. pl. interpretation in specific time contexts with ergative, psych-movement, copulative, passive, and raising verbs (see (66c–g), which correspond point by point to their counterparts in (43)). It has a quasi-existential interpretation in specific contexts with transitive and unergative verbs (66a–b) and a quasi-universal interpretation in generic contexts such as (67):

\[
\begin{align*}
(66) \ a. & \quad \text{Aujourd'hui à Beyrouth, on a tué un innocent.} \\
       \ b. & \quad \text{Aujourd'hui à Beyrouth, on a tiré toute la matinée.} \\
       \ c. & \quad \text{(*)Aujourd'hui à Beyrouth, on est né sans assistance médicale.} \\
       \ d. & \quad \text{Aujourd'hui à Beyrouth, on préoccupe le contingent de l'ONU.} \\
       \ e. & \quad \text{Aujourd'hui à Beyrouth, on est épuisé par la faim.} \\
       \ f. & \quad \text{(*)Aujourd'hui à Beyrouth, on a été inutilement tué(s).} \\
       \ g. & \quad \text{Aujourd'hui à Beyrouth, on a semblé ne pas avoir respecté les conventions internationales.}
\end{align*}
\]

(67) On n'est jamais content.

‘One is never happy.’

It triggers 3rd pers. sing. agreement with the verb (like \( si \)) and with clitic reflexives, but it can perhaps be in a chain (Kayne (1984, 227, fn. 9)) with a 1st pers. pl. NP. See for example (68), from Kayne (1972, fn. 32):

\[
\begin{align*}
(68) \ & \quad \text{Pourquoi Jean et moi ne s’amuserait-on pas à la soirée?} \\
& \text{‘Why Jean and me shouldn’t one (we) amuse oneself (ourselves) at the evening party?’}
\end{align*}
\]

3.6. Arb PRO

Another instance of \( arb \), arbitrary PRO, shows a similar, albeit more complex, picture. It is interpreted as a quasi-universal quantifier when the finite verb that takes the infinitival clause as an argument is generic:

\[
\begin{align*}
(69) \ a. & \quad \text{[PRO tacere] vuol dire [PRO acconsentire].} \\
       & \quad \text{‘To remain silent means to consent.’} \\
       \ b. & \quad \text{[PRO essere stati accusati] per me non significa necessariamente [PRO essere colpevoli].} \\
       & \quad \text{‘Having been accused does not mean for me being guilty.’}
\end{align*}
\]
c. [PRO essere di nobile origine] non può comunque giustificare certe azioni. 
   'To be of noble extraction cannot justify certain acts in any event.'

When the finite V is specific in time reference, a quasi-existential interpretation is possible, as expected,

(70) Avergli risposto sgarbatamente (mi pare fosse stato Carlo) ebbe l'effetto di una provocazione. 
   'To have answered him rudely (I think it was Carlo) had the effect of a provocation.'

even though the interpretation often tends to be either coreferential with a previously delimited set of people or is intended as a 1st pers. pl. pronoun. (In all of these cases care should be taken to eschew matrix predicates that allow for implicit arguments in order to focus on genuine arb PRO.)

What is of interest is that, as with other kinds of arb, ergative, psych-movement, copulative, passive, and raising verbs trigger the loss of the quasi-existential interpretation and induce a 1st pers. pl. reading (although a (discourse) coreferential reading is perhaps also possible):

(71) a. Partire in ritardo (*mi pare fosse stato Carlo) ha significato perdere tutto.  
   'To leave late (I think it was Carlo) meant to lose everything.'

b. L'aver interessato la stampa (*era, come al solito, Carlo) è stato interpretato come indizio di colpevolezza.  
   'To have interested the newspapers (as usual, it was Carlo) has been interpreted as a sign of guilt.'

c. Essere gentili con lui (*è stato, credo, Mario) ha voluto dire irritarlo.  
   'To be kind with him (it was, I think, Mario) implied irritating him.'

d. Essere accusati di parzialità (*era Mario) non ha contato.  
   'To be accused of being biased (it was Mario) did not matter.'

e. Risultare idonei (*mi pare fosse Mario) non ha avuto conseguenze.  
   'To prove suitable (I think it was Mario) had no consequences.'

I will not pursue here the interpretation of arb PRO, many of whose properties are still poorly understood. Of interest in this context has been the parallelism between PRO and the other arb elements.  

To summarize, in this section we have seen that the syntactic contrast noted in sections 1 and 2 between transitive/unergative verbs and all the others is mirrored by a

---

35 Note that insertion of (Mi pare fosse (...) Carlo) 'It seems to me it was Carlo' in the sentences of (69) leads to unacceptability, as we expect.

36 Another well-known feature of arb, shared by all of its realizations (si, on, PRO, object pro arb, and so on), is its limitation to humans. As Paola Benincà (personal communication) observes, there is another case whose interpretation is necessarily limited to humans: that of quantified NPs with a missing head in governed positions (Ho visto tutti 'I saw all'; Sono già arrivati molti 'Have already arrived many'). See Belletti and Rizzi (1981, fn. 9), Cinque (1986, fn. 12). Perhaps they too involve an arb pro, although they can occur in contexts of specific time reference.
comparable contrast in the interpretation of *si* in sentences with specific time reference. The latter contrast has been reduced to the same principles underlying the former in interaction with a general theory of *arb* interpretation.

4. *Si* in Transitive Contexts

4.1. "Agreement and Nonagreement with the Object"

Within the standard analysis of impersonal *si*, *si* in transitive contexts is generally taken to avail itself of one of two options. Either it retains the θ and Case properties of impersonal *si* in intransitive contexts (thus absorbing the external θ-role and nominative Case) or it absorbs the accusative Case while still absorbing the external θ-role. As often noted, in the latter option *si* comes to perform a function closely resembling that of passive morphology.

The accusative rather than nominative Case absorbing property of *si* is generally regarded as entirely optional (see the references cited in footnote 37)—whence the dual possibility shown in (72) (where the option is not taken) and (73) (where it is):

(72) a. Qui, si mangia spesso gli spaghetti.
   ‘Here *si* often eats spaghetti.’
   b. Qui, li si mangia spesso.
   ‘Here *si* often eats them.’

(73) a. Qui, gli spaghetti si mangiano spesso.
   ‘Here spaghetti *si* often eat (are eaten).’
   b. Qui, si mangiano spesso gli spaghetti.

In this view, the lack of agreement between the V and the object NP in (72a) and the possibility of an accusative clitic in (72b) are both direct consequences of the fact that *si* has absorbed nominative Case, leaving the verb’s capability of assigning accusative Case untouched.

Where accusative Case is absorbed, the object NP must become subject, to be assigned nominative Case. As a subject, it may be in [NP,IP] (as in (73a)) or in the "inverted" position (as in (73b)), in the specific case either in [NP,VP] or in a position adjoined to VP (see Belletti and Rizzi (1981), Burzio (1981; 1986)).

Despite its simplicity and appeal, this general approach raises a number of questions. First, the two variants (with and without "agreement with the object") are not equivalent. As many grammatical descriptions of Italian note, the unmarked case is for the verb to agree with the object, the nonagreement option being possible in certain cases (see (72), (74)) and marginal in others (see (75)–(76)) (a comparable situation is apparently found in Spanish):

---

37 See, for example, Belletti (1982a), Chomsky (1981).
38 See, for example, Lepschy and Lepschy (1977, 216), Schwarze (1986, 106, 113).
(74) a. Da qui, si vedono le montagne.
   b. Da qui, si vede le montagne.
      ‘From here si see(s) the mountains.’

(75) a. In Italia non si vedono molti indiani.
   b. ??In Italia non si vede molti indiani.
      ‘In Italy, si do(es) not see many Indians.’

(76) a. In questo negozio, non si fanno mai sconti.
   b. ??In questo negozio, non si fa mai sconti.
      ‘In this shop, si never makes discounts.’

Second, this approach does not clarify why si can optionally absorb either nominative or accusative, indifferently, when both are present. This is a quite unprecedented state of affairs. Passive morphology, for example, does not have the same option, as can be seen from those languages such as German that also allow for impersonal passives. In German, in those environments where both (structural) accusative and nominative are assigned, passive morphology may only absorb the accusative:39

(77) a. Der Brief wurde von ihnen geschrieben.
      ‘The letter(nom.) was by them written.’
   b. *Es wurde den Brief von ihnen geschrieben.
      ‘It was the letter(acc.) by them written.’

Third, and more important, the idea that si can retain in transitive contexts the properties it has in unergative ones (those of absorbing the external θ-role and nominative) appears to run counter to a well-established generalization (Burzio (1981, chap. 3; 1986, sec. 3.1)) according to which "all and only the verbs that can assign θ-role to the subject can assign (accusative) case to an object" (1986, 178).

The half of the generalization that is relevant here is the one by which only verbs that assign a θ-role to [NP, IP] can assign accusative Case. Following Burzio, we can express this as follows:

(78) −θs → −A

39 This follows, in fact, from Burzio’s Generalization, which I address shortly in connection with si. I take French to pattern like German, despite prima facie evidence. In such cases as (i),

(i) Il a été écrit une lettre.
      ‘It was written a letter.’

which look like they contain an impersonal passive form of a transitive verb, I assume, following Belletti (1986), that the NP in [NP, VP] receives, not (structural) accusative, but an inherent Case (possibly partitive). See also Pollock (1981; 1982; 1984) and section 5.1 below for discussion.

Abraham (1986) notes the existence of certain cases in German where nominative is absorbed even in the presence of an accusative object:

(i) Hier darf nicht Teppiche geklopft.
      ‘Here must (sing.) not carpets (acc. pl.) beaten.’

Interestingly, he adds that "intuitively, there is a flair of an incorporated [object] to be noted in such cases warranting the canonic compounding orthography in German (Hier darf nicht teppiche geklopft)"—which suggests that these cases are not genuine counterexamples. See Abraham’s article for further discussion.
As he notes, in the context of $NP_{-\theta} V NP$ "where 'NP_{-\theta}' is a NP which is not assigned a $\theta$-role, ... the NP to the right of $V$ ... will never appear in the accusative" (1986, 179)—an observation true as a matter of empirical fact.

Now, if such cases as (72a–b) were to contain [+arg] $si$, which, as an [NP,IP] clitic, "withholds" the external $\theta$-role (and absorbs nominative) while permitting the verb to assign the accusative, they would represent the only case contradicting (78). The NP in [NP,VP] would still receive accusative Case despite the fact that the NP in [NP,IP] is assigned no $\theta$-role.\(^{40}\)

To reconcile Burzio’s Generalization with the idea that $si$ in (72) is [+arg] $si$ (absorbing the external $\theta$-role and nominative), one would have to say either that the external $\theta$-role is first assigned to [NP,IP] and then transmitted from there to $si$, or, as Luigi Rizzi (personal communication) has pointed out, that Burzio’s Generalization simply makes reference to the assignment of a VP-external $\theta$-role and that $\theta$-role absorption by $si$ (in Infl) qualifies as such an assignment.

However, there is independent empirical evidence that, in those transitiv contexts where no “agreement with the object” takes place, $si$ is [–arg] rather than [+arg] $si$ (hence also evidence for our interpretation of Burzio’s Generalization). [–arg] $si$ will not absorb the external $\theta$-role, so that the verb will be able to assign accusative unproblematically. Let us consider the evidence.

If indeed transitive contexts with no “agreement with the object” can only contain [–arg] $si$ to comply with Burzio’s Generalization, an immediate prediction follows. As [–arg] $si$ is barred from untensed contexts, transitive verbs that fail to “agree with the object” should be uniformly excluded in such contexts. This is indeed the case. See the systematic contrast between (79) and (80), where “agreement with the object” obtains (which renders it possible for $si$ to be [+arg], as I argue below):

   ‘It seems/must $si$ have been sold(sing.) few cars.’

   ‘I esteem $si$ to have been sold(sing.) few cars.’

c. *?Essendosi venduto poche automobili, ...
   ‘Having $si$ sold(sing.) few cars, ...’

(80) a. Sembrano/Devono essersi vendute poche automobili.
   ‘Seem to/Must have been sold(pl.) few cars.’

\(^{40}\) Classical Latin (in which passive morphology is used where in Italian a reflexive form or $si$ is used to construct ergative and impersonal verbs) would seem to provide a counterexample to Burzio’s Generalization. In such forms as *Pallam induitur ‘He puts on the cloak’, corresponding to Italian Si mette il mantello, the verb appears to assign accusative even though [NP,IP] is presumably not assigned the external $\theta$-role (as a function of passive morphology). This, however, can either mean that passive morphology has the option of absorbing a Case distinct from (structural) accusative (perhaps a benefactive dative here—see Kayne (1986))—or that the accusative of *pallam is an inherent accusative. As Ernout (1953, 202) states, ‘Il est rare qu’un médio-passif—en dehors du type pallam induitur (sect. 38)—ait un complément direct d’objet à l’accusatif: dans Hor., A. P. 302: purgor bilium “je purge ma bile’ . . . , on peut reconnaître aussi un accusatif grec de relation: “je me purge quant à ma bile” . . .’
b. Ritengo essersi vendute poche automobili.
   'I esteem to have been sold(pl.) few cars.'
c. Essendosi vendute poche automobili, ...
   'Having been sold(pl.) few cars, ...'

See also the ungrammaticality of (81)–(82), where, for different reasons, no "agreement with the object" is possible:41

(81) a. *Sembra/Deve essersi vendute a un prezzo eccessivo.
   'It seems si them to have sold at an excessive price.'
b. *Ritengo essersi vendute ad un prezzo eccessivo.
   'I esteem si them to have sold at an excessive price.'
c. *Essendogli vendute ad un prezzo eccessivo, ...
   'Si them having sold at an excessive price, ...'

(82) a. *Quando risulta essersi rovinato anche se stessi, ...
   'When it turns out si to have ruined even themselves, ...'
   (compare quando si è rovinato anche se stessi, ...)
   'I esteem si to have ruined even themselves.'
c. *Essendosi rovinato anche se stessi, ...
   'Si having ruined even themselves, ...'

If both (73), where "agreement with the object" takes place, and (72), where it does not, were to be analyzed as containing the same type of si ([+arg] si), the contrast inuntensed contexts between the two variants, with and without "agreement," ((80) vs. (79)/(81)/(82)) would be rather surprising. The contrast follows instead if we take the

41 See Lepschy (1986, 146), where the ill-formedness of such cases as (i), of the same type as (81a), is noted:

(i) *Può capirsi.
   'It is possible one to understand it.'
(i) should in principle be possible, given the well-formedness of (iia–b):

(ii) a. Si può capirla.
   'One can understand it.'
b. Può capire.
   'It can be understood.'

In a number of very perceptive works, Lepschy (1974; 1976; 1984; 1986) has gathered substantial syntactic and semantic evidence to distinguish, in transitive contexts, an impersonal and a passive si.

Note that the ill-formedness of (81) and (i) cannot be due either to the cluster of clitics, since Le si è vendute 'One has sold them' is grammatical, or to the fact that such a cluster is found in an embedded context, since (iia–b) are perfectly acceptable:

(iii) a. Potrebbe essergli venduta una casa.
   'It could to him be sold a house.'
b. Ritengo essergli venduta la casa ad un prezzo troppo alto.
   'I esteem si to have sold him the house at too high a price.'

42 The impossibility for the anaphor se stessi 'themselves' to become a subject is presumably a consequence of Principle A of the binding theory.
former to contain [ + arg] si and the latter to contain [−arg] si, a result consistent with the requirements imposed by (a certain interpretation of) Burzio’s Generalization, as noted.

Let us now turn to consider in more detail the variant with “agreement between the verb and the object.”

4.2. Passive and Middle Si

Consider (73) again:

(73) a. Qui, gli spaghetti si mangiano spesso.
   b. Qui, si mangiano spesso gli spaghetti.

The fact that the D-Structure object NP determines agreement with the finite verb suggests that this NP is the S-Structure subject. Although this cannot be verified directly (see Burzio (1986, chap. 1, fn. 35)), I assume that the NP is assigned nominative Case, given that only nominative phrases are able to determine agreement in Italian.

This implies both that accusative is not assigned (otherwise the NP would receive two conflicting Cases) and that [NP,IP] is nonthetic (otherwise the NP could not move to [NP,IP]; see (73a)). In the classical analysis, this is regarded as an effect of the presence of si, which, much like passive morphology in this case, comes to absorb accusative and the external θ-role.

As Burzio notes, however, the ungrammaticality of such cases as (83)

(83) *Quei prigionieri, vorrebbero [PRO, essersi già liberati e].
   ‘Those prisoners would want si to be already freed.’

does not follow unless we assume that si continues to require nominative Case as in (2b) (= *Sarebbe meglio lavorarsi un po’ di più ‘It would be better si to work a bit more’). See his discussion in section 1.6.2 and footnote 41 of chapter 1 of Burzio (1986).

A solution to this apparent paradox (si appears to absorb both accusative and nominative, with nominative being in fact shared by si and the NP determining agreement) is suggested in Chomsky (1986a). Suppose that in such cases as (84)–(85) si is [ + arg]:

(84) Gli spaghetti si sono già comprati.
   ‘The spaghetti si are already bought (‘have already been bought’).’

(85) Gli spaghetti sembrano essersi già comprati.
   ‘The spaghetti seem si to be already bought (‘to have been bought’).’

As before, this means that si will have to be in a CHAIN assigned nominative Case and will withhold the external θ-role. The latter property, under Burzio’s Generalization, has the further consequence that the verb will simply lose its capacity to assign accusative. Thus, accusative does not need to be “absorbed” by some particular element. If the external θ-role is withheld by si, [NP,IP] is not a θ-position and the NP gli spaghetti may thus be moved to it. The competition of si and the NP in [NP,IP] for nominative
Case is only apparent if we take the Visibility Condition of Chomsky (1981; 1986a) to simply require that a lexical NP be part of a CHAIN assigned Case. In (84)–(85) *si* and the NP *gli spaghetti* are both in a distinct CHAIN, to which nominative is assigned (the CHAIN: matrix subject, (embedded subject), *si*; and the chain: matrix subject, (embedded subject), object, respectively), "so that we have no overlapping chains, but overlapping CHAINS" (Chomsky 1986a, 217).43

In conclusion, we have found both theoretical and empirical reasons to analyze the *si* in transitive contexts that have "no agreement with the object" as [−arg], and the *si* of transitive contexts that have "agreement with the object" as [+arg]. Under that analysis, their respective properties are seen to follow directly.

There is in fact evidence, to be reviewed directly, that a pure passivizer use of *si* also exists autonomously (in what I will call middle structures, for reasons that will become apparent). The facts seem to indicate, however, that such pure passivizer (or middle) use of *si* is not available in all cases.

Let us consider the evidence distinguishing in transitive contexts ([+arg]) impersonal *si*, which for ease of reference I will call impersonal-passive *si*, from middle *si*.

The first relevant observation concerns one aspect of the interpretation of passive *si* constructions. With specific time reference, these structures invariably imply that an agent took part in the event (whatever the verb is):

(86) a. Questo vestito si lavò facilmente, sembra.
   'This suit *si* washed easily, it seems.'
   
b. Questo tavolino si trasportò facilmente, pare.
   'This table *si* transported easily, it seems.'
   
c. Il nemico *si* temette senza ragione.
   'The enemy *si* feared without reason.'
   
d. Carlo *si* invitò con estrema difficoltà, sembra.
   'Carlo *si* invited with extreme difficulty, it seems.'

In contexts of generic time reference, instead, the construction admits (with certain verbs only) a reading where the agent is put into the background, as it were, and the sentence predicates an inherent property of the subject.44 In (87), for example,

(87) a. Questo vestito *si* lava facilmente.
   'This suit *si* washes easily.'
   
b. Questo tavolino *si* trasporta facilmente.
   'This table *si* transports easily.'

the verb *predicates* a property of the subject (that it is *washable, transportable*), which

---

43 I am indebted to Luigi Rizzi for observations that clarified this issue.

44 This should be taken to mean, not that no agent is implied, as with ergatives (see Keyser and Roeper (1984)), but only that no actual agent need exist. Following Hale and Keyser (1986), we may take the difference between middles and ergatives to descend from the fact that an agent is present only in the lexical conceptual structure of the former class of verbs (though it fails to be mapped to the 6-grid of the verb).
is true regardless of whether someone has ever washed/transported it in the past or will ever wash/transport it in the future.

This recalls the similar contrast found with middles in other languages (such as English), where the middle construction is possible only with generic time reference (and a limited class of verbs). Other verbs (such as those in (88)) are less prone, even in generic contexts, to an interpretation that "backgrounds" the agent to simply predicate a property of the subject (The enemy is "killable," Carlo is "hatable," Mario is "celebratable":)

(88) a. Neanche il nemico si uccide senza rimorsi.
   'Not even the enemy si kills without remorse.'
 b. Carlo si odia facilmente.
   'Carlo si hates easily.'
 c. Mario si festeggia con estrema difficoltà.
   'Mario si celebrates with extreme difficulty.'

The contrast is admittedly rather subtle, but it becomes much sharper in untensed contexts. Compare (89) with (90):\textsuperscript{46}

(89) a. (?)Questo vestito ha il vantaggio di lavarsi molto più facilmente di altri.
   'This suit has the advantage of washing more easily than others.'
 b. (?)Questo tavolo ha il vantaggio di traspostarsi con estrema facilità.
   'This table has the advantage of transporting extremely easily.'
 c. (?)La luce gialla ha la proprietà di vedersi bene anche nella nebbia più fitta.
   'Yellow lights have the property of seeing (be seen) well even in the thickest fog.'

(90) a. *Neanche il nemico ha la proprietà di uccidersi senza rimorsi.
   'Not even the enemy has the property of si killing without remorse.'
 b. *Carlo ha il vantaggio di odiarsi facilmente.
   'Carlo has the advantage of si hating easily.'


\textsuperscript{46} Presumably for aspectual reasons, the sentences become better if a modal like potereldovere is inserted (for example, Questo tavolo ha la prerogativa di potersi trasportare anche su una bicicletta 'This table has the property of si being able to transport even on a bicycle'). Insertion of such modals does not seem to affect the status of (90), however. Compare (i):

(i) *Neanche il nemico ha la proprietà di potersi uccidere senza rimorsi.
   'Not even the enemy has the property of si being able to kill without remorse.'

As noted in the text below, one important factor limiting middle formation is animacy of the subject. See the rather sharp contrasts between (89c) and (iiia) and between (90c) and (iib), brought to my attention by Luigi Rizzi:

(ii) a. *Gianni ha la caratteristica di vedersi spesso alle feste.
   'Gianni has the property of si often seeing at the parties.'
 b. Certi anniversari hanno il pregio di potersi festeggiare in famiglia.
   'Certain anniversaries have the advantage of si being able to celebrate with the family.'
c.  "Mario ha il difetto di festeggiarsi con estrema difficoltà.  
'Mario has the defect of si celebrating with extreme difficulty.'

Infinitival control structures are generally taken to be incompatible with passive si.47 Judging from (89)–(90), this is not quite true. The reason for this is that attention was focused on cases that did not lend themselves to a pure middle interpretation. Where the latter is possible, "passive si" appears to be compatible with control.48

This suggests that middle si is a pure ([−arg]) passivizer that eliminates accusative Case and the external θ-role. It differs from ordinary passive morphology in that it is unable to reassign the external θ-role (Questo vestito ha il vantaggio di potersi lavare (*da tutti) 'This suit has the advantage of si being able to wash (by everybody)'). (But see footnote 11.) It also differs from what I have called impersonal-passive si (as found in (86) and (88), for default of middle si) in that it does not need to be associated with nominative. Hence its occurrence in control infinitivals.49

The unsatisfied need for nominative is, then, what causes the ungrammaticality of (83) and (90), where a pure middle interpretation of si is not available.

Other properties distinguish middle si from impersonal-passive si. These properties can, again, be detected only in untensed contexts, since in tensed contexts a form with middle si can always be interpreted as an instance of impersonal-passive si:

47 See Rizzi (1976), Belletti (1982a), Burzio (1981; 1986), Manzini (1983; 1986). See also the contrast in English between "Bureaucrats want to bribe easily, noted in Keyser and Roeper (1984), and This shirt has the advantage of washing easily.

48 Another infinitival context that is apparently compatible with middle si is the infinitival complement to perception verbs where accusative Case is assigned to the embedded subject:

(i) a.  Non ho mai visto spendersi così tanti soldi come quest'anno.
'I've never seen si spend so much money as this year.'

b.  Non ho mai visto acquistarsi così tante merci come quest'anno.
'I've never seen si purchase so many goods as this year.'

Note that these are apparent counterexamples to Burzio's (1986, 291f.) and Manzini's (1986, 244) observation that passive si is impossible in exceptional Case-marking contexts. But they are not if this observation is taken to cover just impersonal-passive si, not middle si. For reasons that I do not understand (ia-b) become unacceptable if the accusative NP is citedized to the matrix verb. See (iia-b), pointed out to me by a reviewer:

(ii) a.  "Non ti ho mai visti spendersi cosi allegramente come quest'anno.
'I've never seen them si spend so merrily as this year.'

b.  "Non te ho mai visto acquistarsi così alla leggera come quest'anno.
'I've never seen them si purchase so lightheartedly as this year.'

Suñer (1975, fn. 10) gives the following Spanish example with middle se embedded in an infinitival clause:

(iii) Al anunciárselo a Juan el resultado le echaron chispas los ojos.
'When one announced the result to Juan, his eyes sparkled.'

For a comparable example in French, see footnote 54.

49 The syntactic distinction drawn here between pure middle si and impersonal-passive si appears to have a semantic reflex in the two senses Lepschy (1976) perceives in sentences like Si vedono le montagne, which "can mean either 'One can see the mountains' (impersonal) or 'The mountains can be seen' (passive)" (p. 158), although he adds that "in many contexts it may be difficult, or even impossible to choose between the two meanings." His impersonal si appears to cover my [+arg] and [−arg] uses of si, whereas his 1st pers. pl. use is treated here as syntactically identical to (though semantically different from) [−arg] impersonal si. See his works (cited in footnote 41) for further, subtle observations concerning the various uses of impersonal si, which are, as far as I can see, fully reproducible in the present system.
Impersonal-passive *si*, but not middle *si*, is compatible with agentive adverbs ((ai) versus (a(ii)):

i. Questi appartamenti *si* vendono volutamente occupati. ‘These apartments *si* sell deliberately occupied.’

ii. Questi appartamenti hanno il vantaggio di vendersi (*volutamente*) occupati. ‘These apartments have the advantage of *si* being sold deliberately occupied.’

b. Impersonal-passive *si*, but not middle *si*, can control the PRO of a purpose clause ((bi) versus (b(ii)):

i. Quell’uomo politico *si* può corrompere (facilmente) per dimostrare la propria influenza. ‘That politician *si* can bribe (easily) to show one’s influence.’

ii. Quell’uomo politico ha il vantaggio di potersi corrompere facilmente (*per dimostrare la propria influenza). ‘That politician has the advantage of *si* bribing easily (to show one’s influence).’

c. Impersonal-passive *si*, but not middle *si*, can control the subject of adjunct small clauses (see Boschetti (1986)) ((ci) versus (c(ii)):

i. Il museo del campo *si* può visitare facilmente anche nudi. ‘The camping museum *si* can visit even naked.’

ii. Il museo del campo ha il vantaggio di potersi visitare facilmente (*anche nudi). ‘The camping museum has the advantage of *si* visiting easily (even naked).’

These contrasts all stem from the presence in the (i) examples, and the absence in the (ii) examples, of [+arg] *si*. They would remain quite puzzling if no distinction were made between impersonal-passive *si* (that is, [+arg] *si* in transitive contexts) and “middle” *si*.

The separation of middle *si* from impersonal-passive *si* has the effect of rendering English and Italian middle constructions more similar than is standardly assumed (for the standard view, see Keyser and Roeper (1984), Jaeggli (1986a)).

Once the interference of the impersonal-passive construction is eliminated, we see that in both languages the middle construction has the following characteristics:

---

As Vinet (1986, 283) notes, control of the PRO of without-clauses is apparently possible in middles:

(i) a. This blouse washes normally without PRO adding any special product.
   b. Ce chemisier se lave normalement sans ajouter de produit spécial.

This suggests, as she observes, that control of such clauses can be exercised by an argument implicit at the level of the lexicon.

On the pragmatic conditions that also render purpose clauses compatible with middles, see Fellbaum and Zrbi-Hertz (1987).
(A) It is natural only with generic time reference:

(92) a. ??Yesterday, the mayor bribed easily. (see Keyser and Roeper (1984, 384),
        Roberts (1985, 369))
        b. *?Il sindaco ha il vantaggio di essersi già corrotto ieri.
           ‘The mayor has the advantage of already *sì being bribed yesterday.’

(B) It does not admit agentive adverbs:

        b. *Il libro ha il pregio di vendersi volutamente.
           ‘The book has the merit of selling voluntarily.’

(C) It does not admit control of the PRO subject of a purpose clause or small clause
    (see also footnote 50):

(94) a. *Bureaucrats bribe easily to show one’s influence.
        b. *I burocrati hanno la proprietà di corrompersi facilmente per dimostrare la
           propria influenza.
           ‘Bureaucrats have the property of *sì bribing easily to show one’s influence.’

(95) a. The floor waxes more easily (*naked).
        b. Questa cravatta ha il vantaggio di potersi indossare facilmente (*nudi).
           ‘This tie has the advantage of *sì being able to wear naked.’

(D) It requires some kind of manner adverb modification:51

(96) a. The wall paints *(easily).
        b. Questo muro ha il vantaggio di dipingersi *(molto facilmente).
           ‘This wall has the advantage of *sì painting (very easily).’

Nonetheless, certain differences persist. For example, although unavailable with
    certain verbs taking animate subject and object (see (88)–(90)), the Italian middle
    construction is more productive than its English counterpart on at least two counts:

(I) It is possible with verbs taking nonaffected theme objects, which disallow the
    middle construction in English (see, for French, Fellbaum and Zribi-Hertz (1987)):

(97) a. La luce gialla ha il vantaggio di vedersi bene anche nella nebbia più fitta.
           ‘Yellow lights have the advantage of *sì seeing even in the thickest fog.’
        b. Certe lingue hanno la proprietà di impararsi con più facilità di altre.
           ‘Certain languages have the property of *sì acquiring more easily than oth-
           ers.’

(II) It is possible with verbs that Case-mark an NP without 0-marking it:

51 Although that requirement can be exceptionally satisfied in other ways (see Keyser and Roeper (1984, 385 and fn. 4) and Fellbaum and Zribi-Hertz (1987)).
(98) a. Certe armi hanno il vantaggio di potersi rendere facilmente [t inoffensive].
   ‘Certain weapons have the advantage of si rendering harmless easily.’
   b. Certe persone hanno la proprietà di non vedersi [t mai litigare tra loro].
   ‘Certain persons have the property of si never seeing quarrel among each other.’

I take these discrepancies to stem from a single difference between the Italian and the English middle constructions, namely, that the construction is syntactic in Italian and lexical in English (Zubizarreta (1982; 1986)). In Italian it is formed by adding in the syntax the morpheme si in its pure passivizer usage. This has the effect of ‘suspending’ the externalization of the external θ-role (whatever that is: an Agent, an Experiencer, a Locative, and so on), just as in syntactic passives, where the “suspension” of the external θ-role is not sensitive to the nature of the internal θ-role.

In English middle formation is instead a lexical detransitivization rule, and as such it may be sensitive to the particular nature of the θ-roles involved (see Roberts (1985) for discussion).

There are two ways in which we can conceive of such a lexical process. According to one, but not the other, the number of structural positions projected in the syntax is reduced. Roberts (1985) opts for the first alternative, since it appears to provide a straightforward solution to the so-called Affectedness Constraint. He proposes that middles are formed by externalizing the theme argument and leaving the external θ-role unassigned. In this view, middles are not derived via NP Movement.

There is, however, another way to capture the Affectedness Constraint while retaining a “transitive” structure and having NP Movement of the theme NP in the syntax.

Given the evidence for the presence of NP Movement in middles discussed by Keyser and Roeper (1984) and Zubizarreta (1982; 1986), I opt here for the latter approach (see, however, Roberts (1985, chap. 4, sec. 4) for some potential problems).

The lexical part of middle formation can be conceived of as a device suspending the assignment of the external θ-role, the internal theme role being regularly assigned to [NP,VP]. As a consequence of Burzio’s Generalization, accusative Case will concomitantly fail to be assigned to [NP,VP].

As to the limitation of middle formation to verbs with affected theme objects, we could take Jaeggli’s (1986a, 607) Affectedness Constraint to be a condition on the lexical process (‘If a complement of X is unaffected, it is impossible to eliminate the external θ-role of X’). Alternatively, if we were to assume that only verbs with affected objects have a genuine Agent subject (call it Agent₁), the lexical part of middle formation could be formulated in such a way as to suspend the externalization of just Agent₁.

Under either of these alternatives, the two differences between Italian and English middles follow from the lexical nature of the English process (constrained by the Affectedness Constraint), in opposition to the syntactic nature of the Italian process.⁵²

⁵² The restrictions observed for Italian middles may instead depend on some semantic condition (sensitive to animacy) on what can function as a (permanent) property (‘being inevitable’ falling outside of the permitted class).
Their common properties are instead a function of the semantics of the construction ((A) and (D)) (see Roberts (1985)) and of the fact that the agent θ-role is syntactically "active" in neither one of the two languages ((B) and (C)). In English it is lexically "frozen." In Italian it is eliminated at the syntactic level, but, in contrast to ordinary passives and impersonal(-passive) *si* constructions, it is rendered "visible" and syntactically active by no argument.

The syntactic nature of the Italian middle construction with *si* is highlighted by a comparison with the ergative (99) and inherent reflexive (100) constructions (see Burzio (1986)):

(99) La macchina si ruppe.
‘The car broke.’
(100) Giovanni si ammalò.
‘Giovanni got ill.’

First, although middle *si* is productive (except for the specific semantic restriction noted in footnote 52), the latter two constructions are lexically highly restricted (and are in fact listed in their ergative and inherent reflexive usages in the dictionary, as noted by Richard Kayne (Ruwet (1972, 105)).

Second, middle *si*, though apparently identical with ergative and inherent reflexive *si*, differs from them in that it is an autonomous morpheme whereas they are the morphological realization of the 3rd pers. reflexive form. The ergative and inherent reflexive constructions admit 1st and 2nd pers. (sing. and pl.) forms as well, but the middle construction does not:

(101) Io mi avvicino.
‘I am going near.’
(102) Io mi ammalò.
‘I get ill.’
(103) *Io mi trasporto facilmente.
(*in the sense ‘I am easy to transport’)*

This may again be suggestive of the different level at which *si* attaches to the verb. Although the reflexive character of a verb may be determined either in the lexicon (ergatives and inherent reflexives) or in the syntax (true reflexives and reciprocals), it seems reasonable to assume that *si*, as an independent morpheme (though identical to the realization of a 3rd pers. reflexive) is projected as such at the syntactic level, since it is neither a feature nor a bound morpheme.

---

53 Richard Kayne (personal communication) made me aware of this limitation, which is apparently not found in English (or in German or French): *I wash easily* (advertising for a shirt), *I do not transport easily* (said by a disabled person). According to my informants, this does not hold for the variant of the middle construction that employs reflexive pronouns: *I wash myself easily, I do not transport myself easily* (see Fiengo (1974)). Abraham (1986) cites such German examples as *Ich unterhalte mich ganz einfach*, which can mean either ‘I am easy to entertain’ or, irrelevantly here, ‘I entertain myself quite easily’. See also Haider (1987, chap. 5).
Despite this difference, the two si’s may still have a unified treatment at a more abstract level. If Kayne (1986) is correct, one may assume that both reflexive morphology and (passivizer) si, as an autonomous element that formally coincides with the realization of the 3rd pers. reflexive, perform the same function: that of dethematizing the [NP,IP] position and suspending the assignment of structural accusative Case, much like passive morphology. It may also be hoped that whatever differences are found between these constructions, and their various uses, they can be reduced to minimally distinct parametric choices: whether the operation takes place in the lexicon or in the syntax; whether the dethematizer is argumental or not; whether it is pronominal or anaphoric; and so on.

To summarize, the [± arg] distinction of impersonal si motivated in section 2 has appeared to play a crucial role in transitive structures as well. In particular, we saw that [− arg] si is necessarily involved where “agreement with the object” does not take place. Where it does, we have seen evidence to distinguish between a genuine impersonal construction involving [+ arg] si and a middle construction, in which si acts as a pure (− argument) passivizer, restricted in certain ways.

5. Some Comparative Remarks

5.1. French

The French form se shows a distribution more restricted than that of its Italian equivalent. Of the various usages of impersonal si in Italian, se appears to have the pure middle use found in generic sentences (see (104)) and possibly the impersonal-passive use found in sentences with specific time reference (see (105)) (the sentences are all drawn from Zribi-Hertz (1982); see also Fellbaum and Zribi-Hertz (1987)).

(104) a. Cet appareil se manie difficilement.
   ‘This appliance se handles with difficulty.’

   b. Ce fa dièse se joue avec le troisième doigt.
   ‘This F-sharp se plays with the third finger.’

(105) a. La question s’est discutée hier dans la salle du conseil.
   ‘The issue se was discussed yesterday in the council hall.’

   b. Le crime s’est commis ce matin.
   ‘The crime se was committed this morning.’

54 Ruwet (1972, 95), however, judges comparable sentences with specific time reference as marginal or impossible (for example, *Ces lunettes se sont nettoyées hier à huit heures et quart ‘These glasses se have been cleaned yesterday at 8:15’). He in fact states that “la construction moyenne ne peut pas être utilisée pour signifier un événement particulier localisé en un point du temps.” Perhaps certain dialects do not possess the impersonal-passive use of se, but only the middle use. As in Italian, se is admitted in control structures whenever a pure middle interpretation is possible:

   (i) La lumière jaune a la propriété de bien se voir dans le brouillard.
   ‘Yellow lights have the property of se being seen well in the fog.’
No impersonal use of \textit{se} is possible, however, for principled reasons. Consider (106), containing transitive verbs, and (107), containing intransitive verbs:

(106) a. \textit{*(II)} se mange souvent les gâteaux ici.
   ‘It \textit{se} often eats cakes here.’

b. \textit{*(II)} se les mange souvent.
   ‘It \textit{se} often eats them.’

(107) a. \textit{*(II)} se dort beaucoup ici.
   ‘It \textit{se} sleeps much here.’

b. \textit{*(II)} se va beaucoup à Paris.
   ‘It \textit{se} often goes to Paris.’

c. \textit{*(II)} s’est heureux dans cette ville.
   ‘It \textit{se} is happy in this town.’

d. \textit{*(II)} s’a été invité beaucoup récemment.
   ‘It \textit{se} has been invited much recently.’

e. \textit{*(II)} s’a semblé ne pas être en ordre.
   ‘It \textit{se} appeared not to be in order.’

The ill-formedness of the variant of (106)–(107) without \textit{il} is certainly related to the fact (Belletti (1982a, sec. 4.2)) that French does not allow for null subjects.\footnote{With a limited class of exceptions in the so-called stylistic inversion construction exemplified in (i) (see Kayne (1972), Kayne and Pollock (1978)):

(i) Je me demande quand pro\textsubscript{\textit{i}} partira ton am\textsubscript{\textit{i}}.
   ‘I wonder when you will leave your friend.’

Still, only passive, not impersonal, \textit{se} is admitted in this construction:

(ii) a. le restaurant où pro\textsubscript{\textit{i}} se mangera la meilleure paella,
   ‘the restaurant where \textit{se} will eat the best paella’

b. \textit{*le restaurant où pro\textsubscript{\textit{i}} se danse jusqu’à minuit}
   ‘the restaurant where \textit{se} dances till midnight’}

Consequently, it permits in \textit{[NP,IP]} neither a pleonastic pro cooccurring with [+arg] \textit{se} nor an argument generic person pro cooccurring with a [−arg] \textit{se} (assuming \textit{se} to be [±arg], like Italian \textit{si}).

The parallel ill-formedness of the variant with \textit{il} (which avoids a violation of the null subject parameter) could instead be attributed to a Case theory violation (again see Belletti (1982a, sec. 4.2), Everett (1984)).

The question is not entirely clear, however. In (106)–(107) there are indeed two lexical nominal elements (\textit{il} and \textit{se}) that compete for the same Case, but as Kayne (1984, chap. 10) notes, two lexical nominal elements can apparently occur in the same thematic chain (\textit{Cela\textsubscript{i} est-il} e\textsubscript{i} faux ‘That, is it false’), provided that the two do not both express the same Case morphologically (and meet other requirements not relevant here). Now, although \textit{il} is a morphologically nominative form, \textit{se} is not (at least not in its characteristic uses). Therefore, a Case theory explanation for the ill-formedness of the variant with \textit{il} may not be correct.
An alternative account is implicit in one of Pollock’s (1985) observations. If \textit{il}, like English \textit{it}, to which it corresponds exactly, must either head no chain or head a CHAIN with a clausal argument (but not with a nominal argument), then (106)–(107) with \textit{il} are correctly excluded. \textit{Se}, which would have to be in a CHAIN with \textit{il} for Case reasons, is not a clausal argument.

Consider now (108), where (108a) minimally differs from (106):

\begin{align*}
(108) \ a. & \quad \text{Il se mange souvent des gâteaux dans ce bistro.} \\
& \quad \text{‘It \textit{se} often eats cakes in this coffee house.’} \\
& \quad \text{b.} \quad \text{Il s’est dit/écrit/découvert/raconté/etc. que Jean est malade.} \\
& \quad \text{‘It \textit{se} was said/written/discovered/told/etc. that Jean is ill.’} \\
& \quad \text{c.} \quad \text{Il se trouve/confirmé/murmure/etc. que Jean est malade.} \\
& \quad \text{‘It \textit{se} finds/confirm\textit{e}/murmurs/etc. that Jean is ill.’}
\end{align*}

The well-formedness of these sentences would seem to contradict the account just given for (106)–(107). But it does not, if we consider such cases more carefully.

Pollock (1981; 1982; 1984) presents substantial evidence that in impersonal constructions such as (109) in French

\begin{align*}
(109) \ a. & \quad \text{Il a été mangé beaucoup de gâteaux.} \\
& \quad \text{‘It was eaten many cakes.’} \\
& \quad \text{b.} \quad \text{Il arrive beaucoup de linguistes au colloque.} \\
& \quad \text{‘It arrives many linguists at the conference.’}
\end{align*}

the postverbal NP is not in a CHAIN with \textit{il} (sharing structural nominative with it) but rather is assigned a distinct Case by the passive past participle and the ergative verb.

Pollock assumes that passive past participles assign accusative, on the basis of sentences like (110), which show a morphologically accusative Case:

\begin{align*}
(110) & \quad \text{Comme il vous l’a été dit/déclaré, le colloque n’aura pas lieu.} \quad \text{(Pollock (1984, (6)))} \\
& \quad \text{‘As it was said/declared it to you, the conference will not take place.’}
\end{align*}

By parity of reasoning, on the basis of sentences like (111), whose relevance was pointed out to me by Richard Kayne,

\begin{align*}
(111) & \quad \text{Comme il me l’est passé par la tête, . . .} \\
& \quad \text{‘As it came to my mind, . . .’}
\end{align*}

one must conclude, contrary to Pollock (1984) (but see his footnote 4), that ergative as well as passive past participles assign accusative.

I take this accusative not to be an instance of \textit{structural} accusative. A conceptual reason for this may be the fact that passive morphology and ergative verbs are normally unable to assign structural accusative, as a consequence of Burzio’s Generalization. That the accusative Case assigned by passive past participles differs from structural accusative Case assignment is confirmed by the following observations. First, such Case
is normally not available to NPs not θ-marked by the passive past participle (but J.-Y. Pollock (personal communication) finds (112) fairly acceptable):

(112) *Il a été trouvé [beaucoup de films très bons].
    'It was found many films very good.'

Second, it cannot be assigned to definite NPs, but only to indefinites (giving rise to the so-called Definiteness Effect):

(113) *Il a été condamné Jean.
    'It was condemned Jean.'

The same is true with ergative verbs:

(114) *Il semble [un homme être arrivé].
    'It seems a man to have arrived.'
(115) *Il est arrivé Jean.
    'It has arrived Jean.'

The inability of passive past participles and ergative verbs to assign Case to θ-marked NPs (see (112)–(114)) suggests that the Case they assign is an inherent Case (see Belletti’s (1986) discussion of partly similar facts in Italian).

In this view, the well-formedness of (108a), repeated here,

(108) a. Il se mange souvent des gâteaux dans ce bistro.

is not problematic for the account given above of the ill-formedness of *Il se mange souvent les gâteaux. It would if des gâteaux in (108a) were assigned structural accusative with the consequence that se and il would have to be in the same CHAIN (assigned nominative).

Given the analysis of (110) and (111), however, the possibility arises of analyzing (108a) in the same terms, with des gâteaux receiving an inherent Case (accusative) in situ by the V mange (while il, which heads a distinct chain, receives structural nominative). In this view, the presence of se, which suspends the external θ-role and structural accusative, has the effect of turning a transitive structure into an intransitive one akin to the ergative (and impersonal passive) construction.

Support for this conjecture comes from the fact that such structures as (108a) share the same two properties noted for the impersonal construction with passive past participles and ergative verbs. The verb loses the capacity to assign Case to an NP that it does not θ-mark (116) and to definite objects (117):

(116) *Il se considère [beaucoup de personnes malades].
    'It se considers many people ill.'
(117) *Il se mangera ce poisson avec appétit.
    'It se will eat this fish with appetite.'
The same account appears to extend to (108b–c), repeated here,

(118) a. Il s’est dit/écrit/découvert/raconté/etc. que Jean est malade.
   b. Il se trouve/confirme/murmure/etc. que Jean est malade.

except that possibly no inherent Case is required by the complement clause. Se suspends the external θ-role and (structural) accusative, whereas il receives (structural) nominative.56

Another apparent problem for the analysis of se sketched here is provided by the well-formedness of sentences like (119)–(120), which contain an apparently intransitive verb:

(119) Il s’est discuté/traité/décidé/parlé de ce point à la dernière réunion.  (from Zribi-Hertz (1982, fn. 28))
   ‘It se is discussed/treated/decided/spoken/etc. of this point at the reunion.’
(120) Il se réfléchit à de drôle de choses.  (from Gross (1975, 102), cited in Belletti (1982a, fn. 34))
   ‘It se ponders about strange things.’

The general ill-formedness of se with (unergative) intransitives was attributed above to the fact that, for Case-theoretic reasons, se must be part of a CHAIN with il, thus violating the requirement that il not be coindexed with a nonclausal argument. Why, then, is se possible in (119)–(120)?

It can be observed that most of these apparently exceptional cases contain verbs that have an internal theme argument preceded by the preposition de (as in (119)), more marginally by other prepositions (as in (120)). Moreover, with most of these verbs (discuter/traiter/décider/etc.) the preposition is entirely optional.57

This may be taken to suggest, as Belletti (1982a, fn. 34), Zubizarreta (1986, chap. 4, fn. 9), and Dobrovie-Sorin (1987, 488, fn. 21) point out, that such verbs retain the capability of assigning structural accusative. Se suspends (or absorbs) it, while the theme argument receives an inherent Case that may be realized either as accusative or as a PP (typically) headed by de. If something along these lines is correct, (119)–(120) cease to be exceptional vis-à-vis the syntax of middle se. In particular, se does not need to be in a CHAIN with il.

56 Similarly to passive morphology: Il a été rappelé/prévu/jugés/suggéré/etc. que Jean est malade ‘It was reminded/foreseen/esteemed/suggested/etc. that Jean is ill’. In passivization of intransitive verbs, it is occasionally claimed that nominative is absorbed by passive morphology (see, for example, Hoekstra (1986, 100f.)). I do not adopt this position here, since I assume that nominative is required by il. As Luigi Rizzi (personal communication) suggests, in impersonal passivization one can think that passive morphology either absorbs no Case or absorbs accusative (which is potentially available through Burzio’s Generalization).

As to the contrast between French/German (which have impersonal passives) and Italian/English (which do not), I follow an idea of Burzio (1986, 147, 192) and Von Stechow (1987), who suggest that certain languages, but not others, allow for CHAINs containing no argument (a marked option taken by French and German, but not Italian or English).

57 Fellbaum and Zribi-Hertz (1987, fn. 4) note that in their prepositional usages such verbs ‘sont étiquetés ‘transitifs indirect’ dans la plupart des manuels de grammaire française.’
There is, in fact, some evidence that these verbs are indeed treated as transitives. This evidence is provided by their behavior with respect to one property distinguishing transitive from intransitive verbs in the impersonal construction (Zribi-Hertz (1982)). With respect to this property, the verbs in (119)–(120) (which we may call for ease of reference pseudo-intransitives) pattern with transitive verbs.

The property is illustrated by the contrast between (121) and (122) (= (22d) and (22a) of Zribi-Hertz (1982)):

(121) Il a été parlé au colloque (*par plusieurs américains).
     'It was spoken at the conference by many Americans.'
(122) Il a été mangé du poulet par plusieurs clients.
     'It was eaten chicken by many customers.'

(121)–(122) show that in the impersonal construction a by-phrase is admitted with transitive but not with intransitive verbs.

The pseudo-intransitives of (119)–(120) allow for such a by-phrase, however, thus clearly falling into line with transitives:

(123) Il a été parlé/discuté de ceci par plusieurs personnes. (= (IXa) of fn. 11 of Zribi-Hertz (1982))
     'It was spoken/discussed about this by many people.'

5.2. Rumanian

Rumanian impersonal se also differs in part from Italian impersonal si (Dobrovie-Sorin (1987, sec. 5.3)). In terms of the analysis sketched above, the difference appears to be characterizable simply by saying that Rumanian lacks the [−arg] use of the morpheme, despite its being a null subject language. This implies that se should be found with transitive and unergative verbs but never with ergative, psych-movement, copulative, passive, and raising verbs, even in finite clauses. Except for the ergative case, this appears to be correct:

(124) (Trans) Piesa asta s-a jucat anul trecut.
       'This piece se played last year.'
(125) (Unerg) S-a cîntat bine.
       'Se sang well.'
(126) (Erg) Ieri s-a ajuns tîriziu acasa.
       'Yesterday se arrived home late.'
(127) a. (Psych) *S-au speriat mulți copii.
       'Se have frightened many kids.'
b. (Cop) *În țara asta nu se e bucuros.
       'In this country se is not happy.'
c. (Pass) *Adesea se e tradat de prieteni falsi.
       'Often se is betrayed by false friends.'
d.  (Rais)  *Se pare a fi bucuroas.
    ‘Se seems to be happy.’

Concerning the unexpected well-formedness of the ergative case (126), it should be noted that not all ergatives are possible with se (Dobrovie-Sorin (1987, 493)), which may suggest that those that are, are in fact reanalyzed as unergatives (for this suggestion, again see Dobrovie-Sorin (1987, 495)). Possibly relevant to this difference from Italian is the fact that ergatives in Rumanian select auxiliary have.

If Rumanian has no [−arg] se, then se should also be impossible in transitive contexts where the verb does not “agree with the object” (this is due to the fact that there [+arg] se is also excluded as an effect of Burzio’s Generalization)—a correct result. See (128), noted by Dobrovie-Sorin (1987, 497), which contrasts with the well-formedness of its Italian (and Spanish) equivalents:58

(128) *În școala asta se pedepseste prea des pe elevi.
    ‘In this school se too often scold the pupils.’

5.3. Spanish, Catalan, and Portuguese

The distinctions suggested for Italian appear in general to extend to Spanish, Catalan, and Portuguese. Where differences appear, care should be taken to see whether they cannot reduce to independent differences. For example, most speakers reject sentences like (129),

(129) *Parace trabajarse bien en esta biblioteca.
    ‘It seems se to work well in this library.’

with ([+arg]) se embedded under parecer, a raising predicate ((129) is acceptable for Ivonne Bordelois). It is then interesting that the following sentences, which involve raising of a pleonastic pro, are also generally excluded (the judgments are Esther Torregó’s (personal communication)):

(130) a. ??Resulta fumar Juan.
    ‘Turns out to smoke Juan.’

b. ??Parecen fumar los niños.
    ‘Seem(pl.) to smoke the children.’

All speakers appear, instead, to accept se embedded under poder.59

58 Interesting indirect confirmation that Rumanian lacks [−arg] se appears to come from the fact (pointed out to me by Carmen Dobrovie-Sorin) that Rumanian se, unlike its counterparts in the other Romance languages, never has a 1st pers. pl. interpretation. Above, it was suggested that such an interpretation is only found in contexts where [−arg] si/se is found. Thus, if Rumanian lacks [−arg] se, it is expected that it will lack the interpretation in question.

59 A potential problem for the extension of the above analysis of passive si to Spanish is raised by the following examples, from Zubizarreta (1982, 151) and Otero (1986, 103), respectively,

(i) a. Debe comerse las castañas con vino caliente.
    ‘Must(sing.) se eat chestnuts with hot wine.’
(131) Puede comerse bien en Gerona.
   'Can se eat well in Gerona.'

5.4. Some Northern Italian Dialects

Some of the dialects of the Veneto area provide additional interesting data for a parametric analysis of impersonal *si* constructions. For example, according to Zubizarreta (1982, 150ff.), Trentino lacks passive *si* (middle and impersonal) altogether. See the contrast reported by her between (132a), a passive form, and (132b), a case of Left Dislocation:

(132) a. *Le castagne se magna col vin caldo.*
   'Chestnuts *se* eat (are eaten) with hot wine.'
   b. Le castagne, se le magna col vin caldo.
   'Chestnuts *se* (one) eats them with hot wine.'

Paduan and Venetian show yet another phenomenology. In the framework developed here, the difference between these dialects and Italian appears to be easily characterized. Although they possess middle *si* (unlike Trentino; see (133a–b)) and *[−arg] si* (see (133c)), there is no evidence that they possess *[+arg] si*:

(133) a. El terso canae se vede ben ancuo.
   'The third channel *se* sees well today.'
   b. El terso canae ga el difeto de vedarse mae.
   'The third channel has the defect of *se* seeing badly.'
   c. Se o ga magnà voentiera.
   'Se has eaten it willingly.'

In other words, they systematically prohibit *se* in exactly those contexts that were analyzed above as admitting only *[+arg] si* (infinitival sentences under raising and gerundive Aux-to-Comp constructions). See (134a–b), which contrast with the Italian equivalents (135a–b):

(134) a. *Dovaria verse magnà ben eà.*
   'Se should have eaten well there.'
   b. *Vendose magnà ben, ...*
   'Having *se* eaten well, ...'

(135) a. Dovrebbe essersi mangiato bene là.
   b. Essendosi mangiato bene, ...
Indirect support for this conclusion (and for the analysis of impersonal-passive *si* in Italian suggested above) comes from another difference between Paduan/Venetian and Italian—a difference that in the present analysis is not unrelated to the one we have just seen.

Paduan and Venetian appear not to allow for passive *si* with specific time reference (Paola Benincà (personal communication) and Lepschý (1984, 71)), but only to allow for it with generic time reference. This suggests that they have only middle *si*, not impersonal-passive *si*, which is in fact expected if impersonal-passive *si* is simply [+arg] *si* in transitive contexts, and if Venetian/Paduan lacks [+arg] *si*, as evidenced by (134). See the contrast between (136a–c) and their equivalents in Italian in (137a–c):

(136) a. *Maria se ga invita na volta.  (≠ refl.)
   'Maria se has (was) invited once.'

   b. *Ana dovaria verse ciama do volte.  (≠ refl.)
   'Ana should have *se* been called twice.'

   c. *Mario se ga visto in strada poco fa.  (≠ refl.)
   'Mario *se* has (was) seen in the street a while ago.'

(137) a. Maria si è invitata una volta.

   b. Anna dovrebbe essersi chiamata due volte.

   c. Mario si è visto in strada poco fa.

6. Some Remarks on Parametrization and the Acquisition Problem

In the previous sections the following distinct "uses" of *si* have been singled out on the basis of their different syntactic properties:

(138) a. Impersonal [+arg] *si*

   b. Impersonal [−arg] *si*

   c. Passivizer (middle) *si*

Recall also that in transitive contexts [+arg] *si* (called for convenience impersonal-passive *si*) correlates with "agreement with the object" and [−arg] *si* correlates with lack of agreement.

As noted, the first two can be seen as two minimal variants of a single entity: an *arb* [NP,IP] clitic. Some of its properties descend from this minimal characterization. So, for example, its being [+human], unspecified (hence generic) in person, and plural and masculine in number and gender is part of the more general notion of *arb* (shared by other *arb* elements). Other properties follow instead from the different choice of the [±argument] parameter. The fact that it can be either [+arg] or [−arg] is not a property peculiar just to *si*. In the literature it is in fact suggested that other clitics have this option—for instance, clitics entering the so-called clitic-doubling construction (Aoun (1979), Borer (1984b), Dobrovie-Sorin (1987)). More interestingly, it has been suggested (see Burzio (1981; 1986) and, for German, Haider (1985)) that reflexive clitics display the same option. Whereas genuine reflexive/reciprocal clitics (as in Loro *si* temono ‘They
fear themselves/each other’) are [+arg], ergative and inherent reflexive clitics (as in Loro si sono feriti ‘They wounded themselves’ and Loro si sono ammalati ‘They got (themselves) ill’, respectively) are [−arg].

This is particularly significant in view of the desirable unification of impersonal and reflexive si. We have already seen that such a unification can only obtain at a certain level of abstraction, given certain differences between the two and given that impersonal and passive si are instances of a clitic used autonomously (that is, not as the realization of a particular feature combination in a paradigm) whereas reflexive si is precisely the realization of a certain feature combination in a paradigm (its properties being shared by all other reflexive forms).

A promising line of unification is that suggested by Kayne (1986), who also analyzes reflexive clitics as [NP,IP] clitics (which can be either [+arg] or [−arg]).

The features that they share, as well as those that minimally distinguish them, can be summarized in their essence as follows:

(139) a. Impersonal si

\[ arb \text{ [NP,IP] clitic} \]

\[ [ + \text{arg} ] \text{ (absorbs external } \theta\text{-role and nominative)} \]

\[ (\text{impersonal } si) \]

\[ [ - \text{arg} ] \text{ (identifies an } arb \text{ pro in conjunction with personal Agr)} \]

b. ‘‘Passivizer’’ si

\[ [NP,IP] ([-\text{arg}]) \text{ clitic (suspends external } \theta\text{-role and accusative Case)} \]

\[ (\text{middle } si) \]

c. Reflexive clitic:

\[ [NP,IP] \text{ clitic} \]

\[ [ + \text{arg} ] \text{ (absorbs external } \theta\text{-role and VP-internal Case)} \]

\[ (\text{true reflexive}) \]

\[ [ - \text{arg} ] \text{ (suspends external } \theta\text{-role and VP-internal Case)} \]

\[ (\text{ergative reflexive}) \]

\[ [ - \text{arg} ] \text{ (marks the absence of external } \theta\text{-role and VP-internal Case)} \]

\[ (\text{inherent reflexive}) \]

An orthogonal difference is represented by the level at which the clitic forms. We have

\[ 61 \text{ For Kayne (1986), (‘‘object’’) reflexive clitics are in fact to be analyzed as [NP,IP] clitics that ‘‘withhold’’ the external } \theta\text{-role and accusative (or another VP-internal Case, where structural accusative is assigned, as in Gianni se li è comprati ‘Gianni } si \text{ them is bought (‘‘Gianni has bought them for himself’’), with subsequent NP Movement of the Caseless NP). In this respect they are very close in function to the pure ‘‘passivizer’’ use of } si \text{ (middle } si) \text{ and, modulo the different Case that is suspended, impersonal } ([ + \text{arg} ] si, \text{ other differences following from independent differences of the constructions involved.} \]
already seen that impersonal *si*, middle *si*, and [+arg] reflexive clitics are formed at the syntactic level. Thus, except for the case of passivizer *si* (which expressly suppresses it), the external 0-role is syntactically active with impersonal *si* and [+arg] reflexive clitics. [−arg] reflexive clitics appear, instead, to be a product of lexical processes (Burzio (1986, 38)), which preclude a syntactically active behavior of the suppressed external 0-role (Borer (1984a), Rizzi (1986)).

Consider now the parametrization of impersonal *si* from the perspective of markedness and acquisition. The remarks that follow will necessarily be even more tentative than the preceding ones.

If we consider Rumanian (which apparently lacks [−arg] *si*) and the main Romance languages (which possess both [+arg] and [−arg] *si*), it is tempting to posit [+arg] *si* as the unmarked value of the parameter.

In this light, the postulation of the negative value will necessitate the presence of data not reconcilable with just the positive value (data such as (1c–g)). Lack of such data in Rumanian will thus leave [−arg] *si* as a nonactualized option.

Taking [−arg] *si* instead as the unmarked value would apparently leave the difference between Rumanian and the other Romance languages harder to explain. (What would prevent the Rumanian child from positing the existence of [−arg] *se* even in the absence of positive data?)

62 With inherent reflexives, the lexical process appears to be functionally vacuous. There is no external 0-role to suppress, so that the clitic may be simply taken as “a marker associated with lack of 0-role assignment to the subject position” (Burzio (1986, 40)).

Burzio (1986, 39ff., fn. 28) assumes all reflexive verbs to be ergative. There is evidence that a class of them is not, however, as the impossibility of ne-cliticization out of their inverted subject shows:

(i)  a. *Se ne interessano molti di fisica ultimamente.*
    ‘Many are interested in physics lately.’
  b. *Non se ne preoccupano molti dell’avvenire.*
    ‘Not many get worried about the future.’
  c. *Non se ne spaventano troppi, di bambini, qui.*
    ‘Not too many get frightened, of the children, here.’
  d. *Se ne scocciano molti dei tuoi ritardi.*
    ‘Many get annoyed, of your delays.’
  e. *Se ne sono sbagliati molti, di partecipanti.*
    ‘Many went wrong, of the participants.’

(Cconcerning (ie), I differ in judgment from Burzio (1986, 40).) This nonergative class of reflexive verbs appears to be related to the apparently transitive class of psych-verbs studied by Belletti and Rizzi (1986) (La fisica interessa Gianni ‘Physics interests Gianni’, L’avvenire preoccupa molti ‘The future worries many’, and so on). This observation suggests an immediate account for the impossibility of (i). If the input to the lexical rule adding reflexive morphology is the structure argued for by Belletti and Rizzi for their nonreflexive analogues (for example, [vp[vp] interessa la fisica Gianni]), the addition of reflexive morphology can be seen as simply suspending the assignment of inherent accusative to the Experiencer (with the further consequence of forcing NP Movement of the Experiencer and of mapping the theme to the object position of the preposition di ‘of’). Both before and after the addition of reflexive morphology, the Experiencer is not in [NP,VP] (whence its incompatibility with ne-cliticization). I assume that only a lexical process can affect the assignment of an inherent Case present in the Case grid of a lexical item.

If the suggestion is correct, *si*, here, is somewhat between ergative and inherent *si*. Like the latter, it does not require the presence of an external 0-role to suppress. Like the former, it suspends the assignment of (inherent) accusative.
Similar remarks hold for passivizer *si*. Its absence in a language like Trentino suggests that it is simply an option (which needs positive evidence to be postulated).\(^63\)

In sum, it seems that the various combinations of *si*/*se* forms expected under the present analysis in the Romance languages are indeed compatible with reasonable hypotheses concerning their acquisition. One potential problem remains, however. It is provided by Venetian/Paduan, for which [–arg] *si* is attested, but [+arg] *si* is not (as witnessed by the impossibility of (134) and (136)). Under the present assumptions, nothing would seem to prevent the Venetian/Paduan child from positing [+arg] *se*, when exposed to such unergative structures as *Se ga ridesto* ‘One has laughed’ (especially if [+arg] is the unmarked value of the parameter). At present, I see no simple way to reconcile the Venetian/Paduan case with that of the remaining Romance languages. The hope is that a deeper investigation of impersonal *se* in these dialects will eventually suggest a solution that is compatible with the overall analysis proposed in this article.

References


\(^63\) In terms of actual stages of acquisition it seems that, in Italian, impersonal *si* is acquired earlier than middle *si* (see Hyams (1983, sec. IV.3.1)).


